how NFRAP?

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L1110900002
S. CALIFORNIA CHEMICAL
ILD 059483081
SF/HRS

CERCLA
Integrated Site Assessment

Illinois Environmental Protection Agency

2200 Churchill Road
P. O. Box 19276
Springfield, IL 62794-9276

Confidential material may be enclosed.

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1. INTRODUCTION

On September 21, 1993, the Illinois Environmental Protection Agency's (IEPA) Site Assessment Unit was tasked by the United States Environmental Protection Agency (U.S. EPA) to conduct a CERCLA Integrated Site Assessment of the Southern California Chemical Company site located in Union, Illinois.

The site was initially placed on CERCLIS (Comprehensive Environmental Response, Compensation and Liability Act Information System) in March, 1989 as a result of a request for discovery action initiated by the State of Illinois. This action was taken because of contamination found in the Village of Union Well Number 3.

The facility received its initial CERCLA evaluation in the form of a Preliminary Assessment (PA) report that was completed by Ken Corkill of the Illinois EPA in February, 1990. In April, 1994, the Illinois EPA's Site Assessment Unit prepared and submitted to the Region V offices of the U.S. Environmental Protection Agency an Integrated Assessment inspection work plan for the Southern California Chemical Company facility. The sampling portion of the Integrated Site Assessment inspection was conducted on May 4 and 5, 1994 when the Illinois Environmental Protection Agency sampling team collected a total of one municipal well, two monitoring well and ten soil samples.

The purpose of the Integrated Assessment has been developed from USEPA directive and guidance information which

outlines Site Assessment program strategies. The information states:

> The Integrated Assessment will be conducted to: 1) Collect data which would satisfy both site assessment and remedial program activities. This would incorporate hazardous waste, surface water, air and groundwater concerns. 2) The objectives of the assessment are to determine whether time or non time critical removals are warranted and to determine whether the site is National Priorities List (NPL) caliber. If the determination is made that the site is NPL caliber, additional data will likely be needed to complete the assessment. A sampling plan to accommodate removal and site assessment needs, as well as initial remedial needs should be developed. 3) Determination of sampling needs will be accomplished with an understanding to assure adequate data for the removal assessment and the preparation of the Hazard Ranking System (HRS) score as well as the need for possible initial sampling for the remedial investigation. Based on the preliminary HRS score and removal program information, the site will then either be designated as No Further Action (NFA) or carried as an NPL listing candidate. Sites that are designated NFA or deferred to other statutes are not candidates for an Integrated Assessment. 4) Upon completion of the data gathering there will be a determination of whether the site should be forwarded within the Superfund process, either through the remedial or removal programs.
>
> The initial assessment of a site as it enters the Superfund program within Region V will be conducted by either a Regional On-Scene Coordinator (OSC) and a Site Assessment Manager (SAM) or by State personnel. An OSC and a SAM will be assigned for all new sites entering the Regional Superfund program. If an emergency is found to occur, USEPA or state emergency removal staff will be immediately contacted for action. If the site needs further Superfund activities a Site Assessment Team (SAT), comprised of the State, the SAM, the Regional Project Manager (RPM) and OSC will be formed. As necessary, additional data can be generated for the SAT to make a recommendation to the Regional Decision Team (RDT) for further possible action.
>
> The Integrated Assessment will address all the data requirements of the revised HRS using field screening and NPL level Data Quality Objectives (DQO's) prior to data collection. It will also provide needed data to support remedial investigation workplan development.

Only sites that appear to score high enough for NPL listing and that have not been deferred to another authority will receive an Integrated Assessment.

An Integrated Site Evaluation form pertaining to site specific operations and waste characteristics was completed and forwarded to U.S. EPA Regional offices. Upon review U.S. EPA program managers assigned On-Scene Coordinator, OSC, Don Bruce to Southern California Chemical Company. Substances documented to be present at the site in concentrations greater than established Removal Action Levels include: chromium (at concentrations of 1,090 ppm) and copper (at concentrations of 22,400 ppm). These concentrations were found in soil sample X103 collected at a depth of six to eight inches.

Based on this author's initial findings, and a conversation with the assigned Regional On-Scene Coordinator it was determined that the site does not pose an immediate threat to human health or the environment that would warrant a response action. Although no immediate removal threat is presently warranted, further investigation may provide additional information. In the event that future analytical information at this site documents the presence of a potential hazard to human health or the environment, this information will be presented to the Region V CERCLA removal program for reassessment.

1

2. SITE BACKGROUND

2.1 INTRODUCTION

This section includes information obtained over the course of the formal CERCLA Integrated Site Assessment inspection investigation and previous Illinois Environmental Protection Agency activities involving this site.

2.2 SITE DESCRIPTION

The Southern California Chemical Company site originally consisted of three parcels of property. Parcels one and two consisted of the inactive manufacturing plant located at 17415 Jefferson Street, McHenry County, Illinois. This property consists of approximately 2.5 acres and is in the process of RCRA (Resource Conservation and Recovery Act) Closure. This property is currently owned by PHIBRO-TECH, Inc. of Ft. Lee, New Jersey. The third parcel consists of a dump area of approximately 5 acres of land adjacent on the east side of parcel two. The Integrated Site Assessment inspection focused on parcel three since parcel one and two are covered under RCRA authority and currently undergoing a closure activity.

The dump area property is currently under uncertain ownership. A Tax Records check at the McHenry County Courthouse in Woodstock, Illinois on March 30, 1994 indicated that the taxes on the property have been delinquent since 1987 and that the last person to pay the taxes was Edwin B.

King of CALSO IL CORP in Austin, Texas. The property was alleged to have been purchased at a tax auction held in 1992 but according to the Tax Office no one has redeemed the property to date and there is no other owner on record.

The Southern California Chemical Company site and dump area is located in the southeast portion of the village of Union, McHenry County, Illinois. The property is bordered on the north by Jefferson Street, on the east by private property, on the west by the Solarcrete Corporation and on the south by railroad tracks and farmland. North of the property across Jefferson Street lies Evergreen Park School and the So Good Bar-B-Que Company that makes bottled Bar-B-Que sauce. The site is situated in the Northwest quarter, Southeast quarter, Section four, Township forty-three North, Range six East of the Third Principal Meridian in McHenry County, Illinois. A four mile radius map of the area surrounding the Southern California Company site and a fifteen mile surface water map is provided in Appendix A and B of this report.

2.3 SITE HISTORY

According to Illinois Environmental Protection Agency files, site representative interviews and McHenry county courthouse records, the property where the chemical manufacturing took place is owned by PHIBRO-TECH, INC. and the dump area to the east is owned by Edwin B. King of CALSO IL CORP of Austin Texas, who hasn't paid the property taxes

since 1987. Past uses of the property included a grain processing plant, a milk processing plant and an asphaltic roofing plant. The inorganic chemical manufacturing operations at the site began in 1970 when the original owners of Southern California Chemical Company leased the facility. They purchased the facility in 1982, which consisted of three parcels of land known as parcels one, two and three. The current owners of the company (PHIBRO-TECH, INC.) purchased parcels one and two but did not purchase parcel three, which is five acres adjacent east of the manufacturing parcels, in 1984. The current owners operated the facility until closing in 1988.

The original manufacturing facility consisted of four buildings of approximately 24,000 square feet located on two and a half acres of land. Activities conducted by Southern California Chemical Company involved the manufacture of various inorganic chemicals including copper sulfate pentahydrate and copper oxide, proprietary and patented continuous ammonia etchants as well as the recycling and refining of spent circuit board etchant which was resold to the printed circuit board processors after purification. Proprietary products manufactured included solder strippers, brighteners, conditioners and types of etchants. A by-product of copper oxide residuals was sold to the agricultural and wood preserving industries. Feedstocks for the etchant recycling process consisted of a portion of the received spent etchant being placed in a reaction vessel charged with

sodium hydroxide which results in a reaction that formed ammonia and a suspension of cupric oxide. The ammonia was scrubbed with hydrogen chloride which resulted in a solution of ammonium chloride. The ammonium chloride was placed, along with the other portion of spent etchant, into another reactor vessel where anhydrous ammonia and air were added which resulted in a refined printed circuit board etchant which was sold back to the printed circuit board manufacturers.

The company had a number of hazardous waste storage containers, including six aboveground storage tanks of six thousand to ten thousand gallon capacity and potential storage capacity for up to twelve hundred fifty-five gallon drums. The facility shut down operations and removed process equipment in 1988. The parcel of land located east of the manufacturing area has exposed fragments of buried printed circuit boards which were deposited over the years the facility was in operation.

2.4 APPLICABILITY OF OTHER STATUTES

Southern California Chemical Company was regulated under RCRA (Resource Conservation and Recovery Act) and is in the process of undergoing RCRA Closure of the area used for manufacturing. This closure process does not involve the dump area to the east.

The facility was issued permit number 111090AAG by the Illinois Environmental Protection Agency's Division of Air Pollution Control on March 16, 1983 for the operation of one

scrubber used in the ferric chloride process. The IEPA Division of Land Pollution Control issued the company Permit Number 1981-45-OP in 1981 to operate a waste management site to recover spent etchant; and the Illinois EPA Division of Water Pollution Control issued permit 1984-EB-2998 on February 6, 1984 for a concentration, precipitation and pH adjustment industrial treatment works to treat 11,250 GPD DAF of copper oxide production and wash wastewater with force main discharge to the Kishwaukee River but the treatment works was not constructed.

SITE LOCATION

FIGURE 2-1.

STATE OF ILLINOIS LOCATION MAP

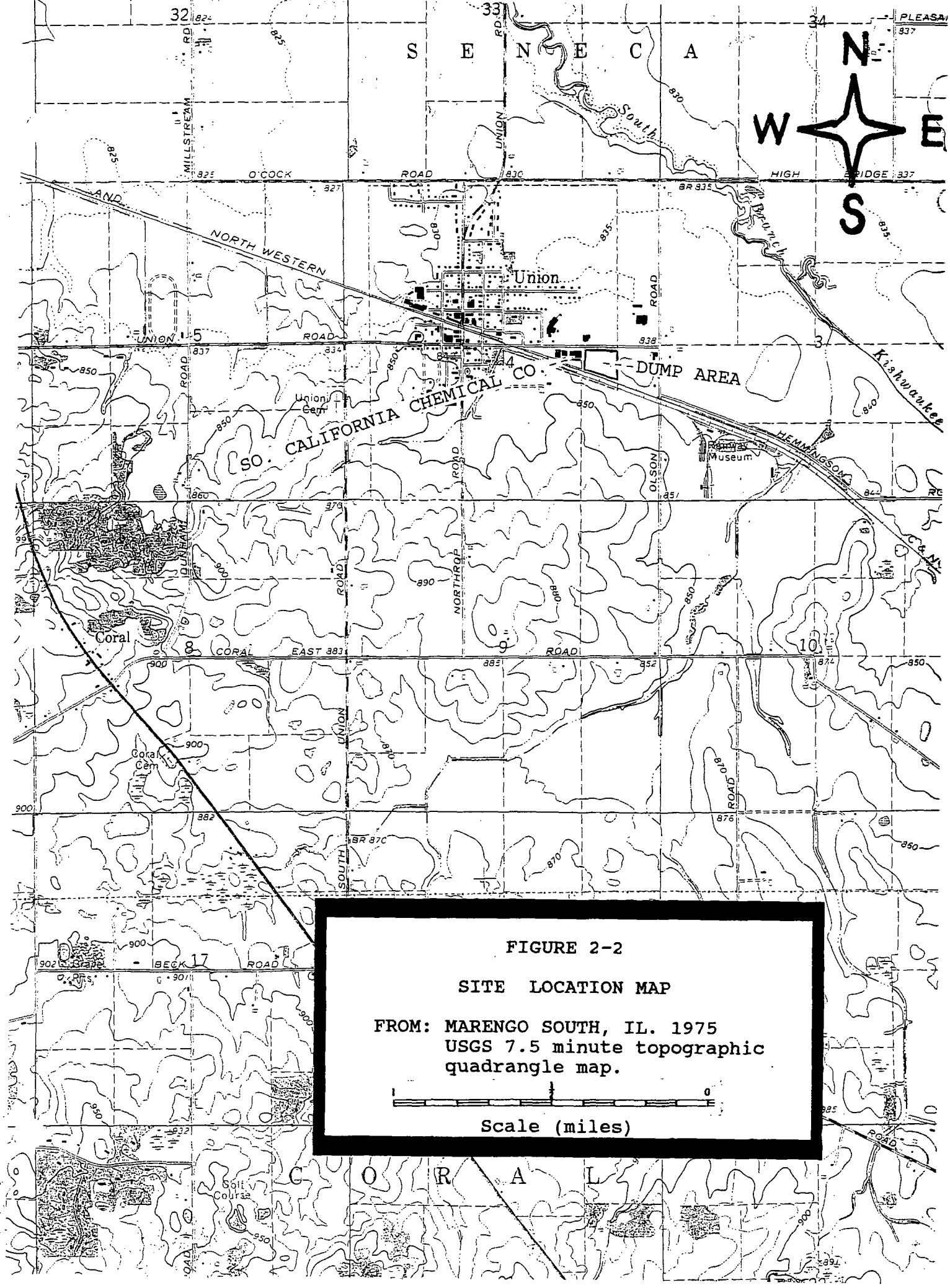

FIGURE 2-2

SITE LOCATION MAP

FROM: MARENGO SOUTH, IL. 1975
USGS 7.5 minute topographic
quadrangle map.

1 0

Scale (miles)

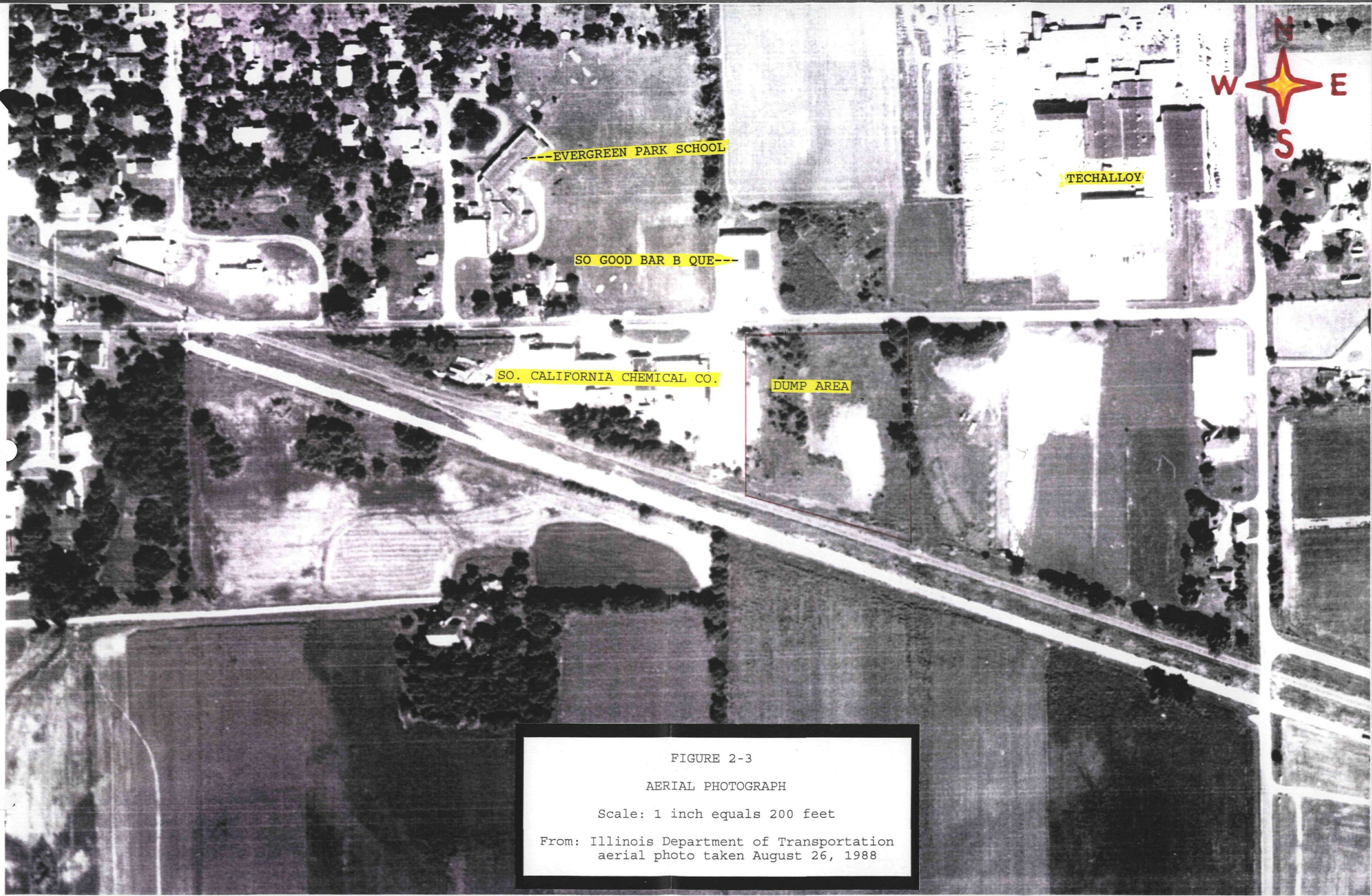

FIGURE 2-3

AERIAL PHOTOGRAPH

Scale: 1 inch equals 200 feet

From: Illinois Department of Transportation
aerial photo taken August 26, 1988

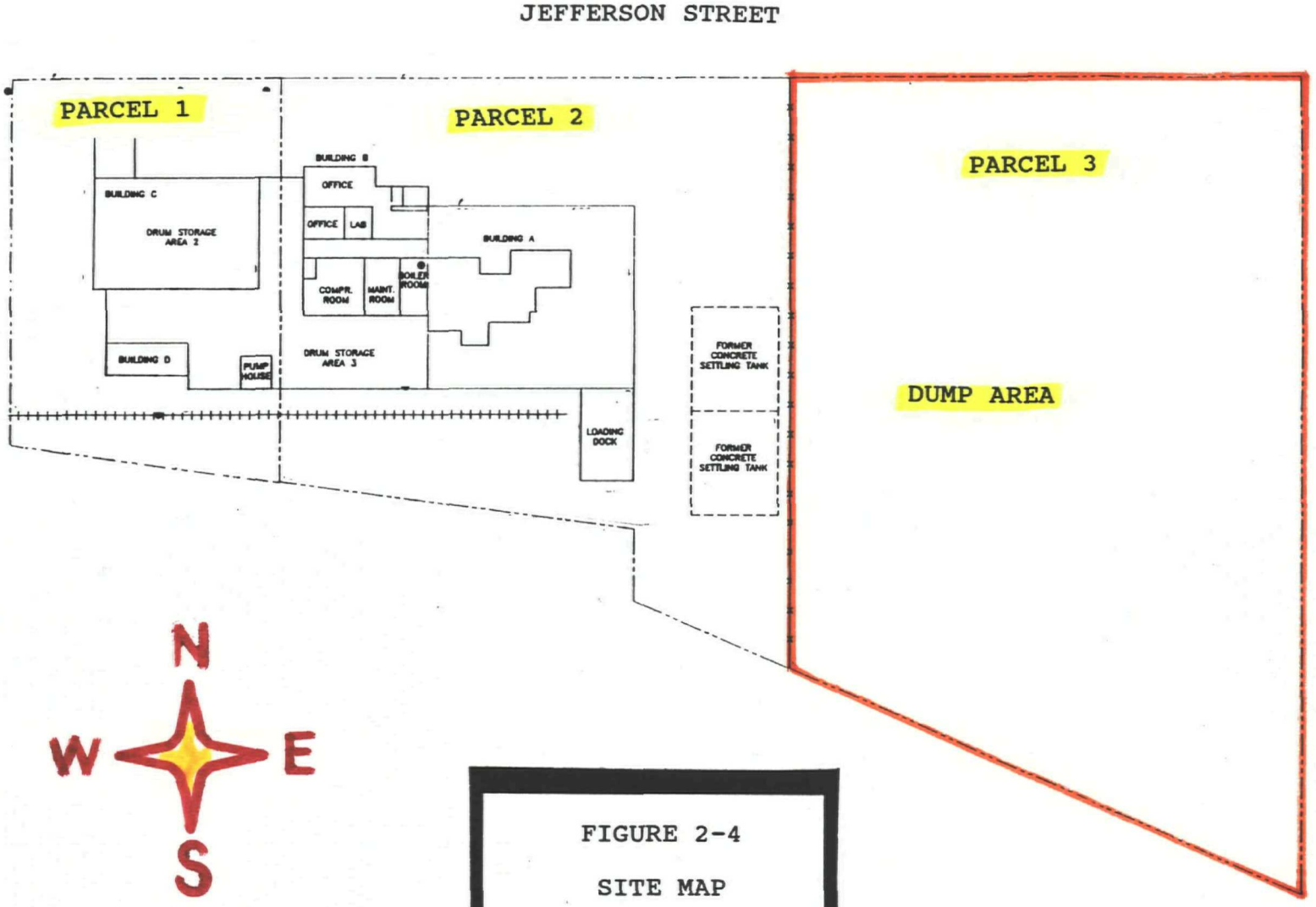

FIGURE 2-4

SITE MAP

Approximate scale:
1 inch = 95 feet

3.0 SITE INSPECTION ACTIVITIES AND ANALYTICAL RESULTS

3.1 INTRODUCTION

This section outlines procedures utilized and observations made during the CERCLA Integrated Site Assessment inspection conducted at the Southern California Chemical Company facility. Specific portions of this section contain information pertaining to the site representative interview, reconnaissance inspection and field sampling procedures. Also included in this section is information about the soil and groundwater samples that were collected during the site inspection, a description of the analytical results and a table indicating the Key Samples and their contaminants. The Integrated Site Assessment inspection for the Southern California Chemical Company facility was conducted in accordance with the site inspection work plan that was developed and submitted to the U.S. EPA Region V offices prior to the initiation of field activities. The U.S. EPA Potential Hazardous Waste Site Inspection Report (Form 2070-13) for Southern California Chemical Company is located in Appendix C of this report.

3.2 RECONNAISSANCE INSPECTION

On March 30, 1994 Mr. Robert Casper and Mr. Kevin Lesko of the Illinois Environmental Protection Agency conducted a Site Reconnaissance Inspection of the Southern California Chemical Company facility at 17415 Jefferson Street in Union, Illinois. The reconnaissance included a visual inspection of

the facility to delineate the extent of their activities, identify potential sampling locations and identify appropriate health and safety concerns. During the reconnaissance visit it was determined that Level D inspection attire could be worn during the sampling activities unless air monitoring equipment detected any concentrations over background levels. After the site reconnaissance visit the route to the nearest hospital was driven as required by IEPA Site Safety Plan standard operating procedures. Prior to the reconnaissance inspection arrangements were made to meet Steve Salisbury at the Union facility. Mr. Salisbury is the Environmental Health and Safety Manager at the Joliet, Illinois plant of PHIBRO-TECH, Inc., which is the current owner of the Southern California Chemical Company property. On the date of the visit Ron Shacklee, property custodian, and Steve Salisbury conducted a tour of the Union facility and the adjacent landfill area located east of the manufacturing plant.

The area used for the manufacturing consists of approximately 2.5 acres and since it is presently undergoing RCRA closure was not considered for soil sampling. This area contains three monitoring wells and two of the monitoring wells near the eastern boundary adjacent to the landfill area were noted as potential groundwater sampling locations. The equipment has been removed from the buildings and the custodian tends to building maintenance and security. The property is fenced on all sides and access is through a

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locked gate or by walking through the locked main building. The exterior grounds is covered with gravel and blue stains were observed in some areas.

The landfill area adjacent to the east consists of an area of disturbed ground along the western boundary and a low area along the east and southern boundaries where water appears to flow during wet weather. This area is classified as a Temporary Emergent Pulustrine wetland according to the national wetland inventory map. The surface drainage pathway to the site is along the CNW railroad tracks along the southern boundary of the property and into the wetland area. A noticeable feature of the low area was a lack of vegetation. Mr. Salisbury said that the low area sometimes is full of water and at times is covered with plant growth. Drainage from the site is north across Jefferson Street into another small wetland area which contains a willow thicket. No readily identifiable drainage pathway could be found beyond this point and there is no apparent Probable Point of Entry into perennial surface water.

The western third of the landfill area consists of disturbed soil with fragments of printed circuit boards exposed on the surface. There are small mounds that appear to be dump areas with trees grown in and around the piles. Mr. Salisbury stated during the recon that the present owners of Southern California Chemical Company have never used the property for dumping and is unaware as to the origin of the piles or printed circuit boards that litter the area.

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Land use around the facility is primarily commercial. Directly north is So Good Bar-B-Que which is a manufacturer of Bar-B-Que sauce. Also north across Jefferson Street is Evergreen Park School. Tech-Alloy is located approximately 500 feet northeast of the site across Jefferson Street and is a RCRA facility. No definite drainage path from the facility could be determined since the area is flat and there is no nearby surface water.

3.3 SITE REPRESENTATIVE INTERVIEW

A site representative interview was held on May 4, 1994 with Steve Salisbury and Ron Shacklee representing Southern California Chemical Company and the author representing the Illinois Environmental Protection Agency. It was explained that the Illinois EPA is primarily interested in sampling the landfill adjacent to the manufacturing area and that the monitoring wells closest to the east boundary would also be sampled. Mr. Salisbury stated that they would split the samples collected on their property but did not need to split the samples collected off of their property. He had the keys to the gate and well locks and stated that he would see to it that we had access and any cooperation from him or Mr. Shacklee that we may require. On May 4, 1994 the Illinois Environmental Protection Agency sampling team of Robert Casper, Peter Sorensen, Greg Spencer and Mark Weber began the site inspection activities.

3.4 SOIL/SEDIMENT SAMPLING

On May 4 and 5, 1994 Illinois Environmental Protection Agency Personnel collected ten soil and one duplicate samples for the purpose of determining if areas of contamination were present at the Southern California Chemical Company facility and surrounding area (see figure 3-1 for sampling locations). The shallow soil samples were collected with stainless steel spoons and trowels whereas the deeper soil samples were collected with stainless steel bucket augers. The soil was transferred directly into the sample jars from the sampling device. Before the spoons, trowels or bucket augers were used at the site, each had been decontaminated at the Illinois Environmental Protection Agency's warehouse. HNU photoionization detector readings were taken during sample collection but no readings over background were detected. During the Integrated Assessment Inspection Level D personal protection was worn.

The soil sample jars and the groundwater bottles were packaged and sealed in accordance with previously documented CERCLA Site Assessment procedures. The IEPA samples were analyzed for the Target Compound List with the organic compounds being analyzed by Southwest Labs of Oklahoma in Broken Arrow, Oklahoma and the inorganic substances by Silver Valley Labs, Inc. of Kellog, Idaho. The drinking water samples from Union Well No. 4 were analyzed by the United States Environmental Protection Agency Central Region Laboratory in Chicago, Illinois. Photographs for the Southern

California Chemical Company Integrated Site Assessment inspection are provided in Appendix E of this report. According to "Soil Survey Report No. 81" for McHenry County, issued August, 1965 by the United States Department of Agricultural Soil Conservation Service, the land where Southern California Chemical Company is situated is classified as containing areas of "Saybrook silt loam", "Volina silt loam to loam" and "Thorp silt loam". The background sample location at Union park is classified as "Volina silt loam to loam". The following table lists the soil samples that were collected on May 4 and 5, 1994:

Table 3-1

Soil Samples

Time	Depth	Location
5/5/94 X101 12:50	6 to 12 "	Background sample collected at Union Park located approximately 3200 feet from the site at a point 183' south and 48 ' west of the intersection of Main and Elm, on the east side of the park.
5/4/94 X102 14:20	2'to 3'	Collected between the dump area and CNW railroad tracks 22' south and 29' east of the southeast corner of the Southern California Chemical Co. fence. Appearance: Brown to black sandy clay.
5/4/94 X103 15:40	6"to 8"	Collected in the dump area 129' east and 31' north of the southeast corner of the Southern California Chemical Co. fence. Appearance: Brown sandy clay layer approximately two inches thick.
5/4/94		

X104 X105 16:15	2' to 3'	Background and duplicate samples collected in the dump area 307' east and 37' north of the southeast corner of the Southern California Chemical Co. fence. Appearance: Black sandy clay.
5/5/94 X106 10:25	2' to 3'	Collected in the dump area 99'6" north and 133' east of the southeast corner of the Southern California Chemical Co. fence. Appearance: Black sandy clay.
5/5/94 X107 10:45	2' to 3'	Collected in the dump area 66' west and 162' south of the northeast corner of the fence along Jefferson Street. Appearance: Black sandy clay.
5/5/94 X108 11:05	2.5'to 3.5'	Collected in the dump area 95' east and 125' south of the northwest corner of the Southern California Chemical Co. fence. Appearance: Black sandy clay.
5/5/94 X109 11:25	6" to 12"	Collected in the wetland area located north of the dump area across Jefferson Street 90' west and 120' north of the southeast corner of fence. Appearance: Black sandy clay.
5/5/94 X110 11:45	6" to 12"	Collected in the wetland area located north of the dump area across Jefferson Street 60' east and 39' south of the north end of the fence located along the east side of the So Good Bar B Que Co. Appearance: Medium brown clayey sand.
5/5/94 X111 12:15	6 to 12"	Collected in the wetland area located north of the dump area across Jefferson Street 75' north and 135' east of the northwest corner of the dump area fence. Appearance: Black sandy clay.

Standard Illinois Environmental Protection Agency decontamination procedures were followed prior to the collection of all samples. The procedures included the scrubbing of all equipment (bailers, spoons, pans, etc.) with

a non-foaming Trisodium Phosphate solution, rinsing with acetone, rinsing with hot tap water again and final rinsed with distilled water. All equipment is air dried, then wrapped and stored in heavy duty aluminum foil for transport to the field. Field decontamination procedures include all of the above except the hot tap water rinse but no field decontamination was necessary during the inspection.

3.5 GROUNDWATER SAMPLING

Southern California Chemical Company has three onsite monitoring wells installed in August, 1992 by Dames & Moore. The nearest private well known to exist in the vicinity of the property is located (b) (9) [redacted]. The nearest municipal drinking water well is Union, Illinois Well No. 4 located (b) (9) [redacted]. Background sample G501 and duplicate G502 were obtained from Union Well No.4 (IEPA Well No. 00276). This is a 760 feet deep well that utilizes the limestone and sandstone aquifers and is cased to 133 feet. The water operator from the Union Water Department stated that the well had been running for approximately one hour. The water in this well was not filtered for total metals since it is used for drinking. Temperature, pH and conductivity measurements were taken prior to collecting the sample and the water was clear with no noticeable odor. HNU readings were taken of the monitoring wells headspace but no readings over background were noted. All monitoring wells were filtered for total metals using a

5 micron in-line filter. The following table lists the groundwater samples collected on May 25, 1993:

Table 3-2

Groundwater Sampling

Time	Depth	Location
G101 11:25	44'4"	Located at the northeast corner of the original So. California Chemical Co. property, near Jefferson Street. Appearance: slightly cloudy.
G102 G103 12:05	55'5"	Located at the southeast corner of the original So. California Chemical Co. property. Duplicate sample also collected. Appearance: slightly cloudy.
G501 G502 17:10	760'	Union Well No. 4, located (b) (9) (b) (9) (b) (9) Appearance: Clear, no odor.

Standard Illinois Environmental Protection Agency decontamination procedures were followed prior to the collection of all samples. The procedures included the scrubbing of all equipment (bailers, spoons, pans, etc.) with a non-foaming Trisodium Phosphate solution, rinsing with acetone, rinsing with hot tap water again and final rinsed with distilled water. All equipment is air dried, then wrapped and stored in heavy duty aluminum foil for transport to the field. Field decontamination procedures include all of the above except the hot tap water rinse but field decontamination was not necessary during the inspection.

3.6 SURFACE WATER SAMPLING

No surface water samples were collected during the May 4 and 5, 1994 Integrated Site Assessment inspection of the Southern California Chemical Company facility. The site is flat and drainage during a storm event would be into the small wetland located north across Jefferson street, where the drainage pathway ends. According to the Flood Insurance Rate Map for the village of Union, the facility lies outside the 500 year floodplain.

3.7 ANALYTICAL RESULTS

This section includes a summary of the analytical results of samples collected during the Integrated Site Assessment inspection conducted at the Southern California Chemical Company site in Union, Illinois. The field activities portion of the CERCLA Integrated Site Assessment inspection included the collection of Three groundwater and ten soil samples by the Illinois Environmental Protection Agency inspection team. The thirteen samples were collected to determine if any U.S. EPA Target Compound List compounds were present at the site or at potential receptors of concern. As previously mentioned the organic compounds were analyzed by Southwest Labs of Oklahoma in Broken Arrow, Oklahoma and the inorganic substances by Silver Valley Labs, Inc. of Kellog, Idaho. The drinking water samples from Union Well No. 4 were analyzed by the United States Environmental Protection Agency Central Region Laboratory. A quality

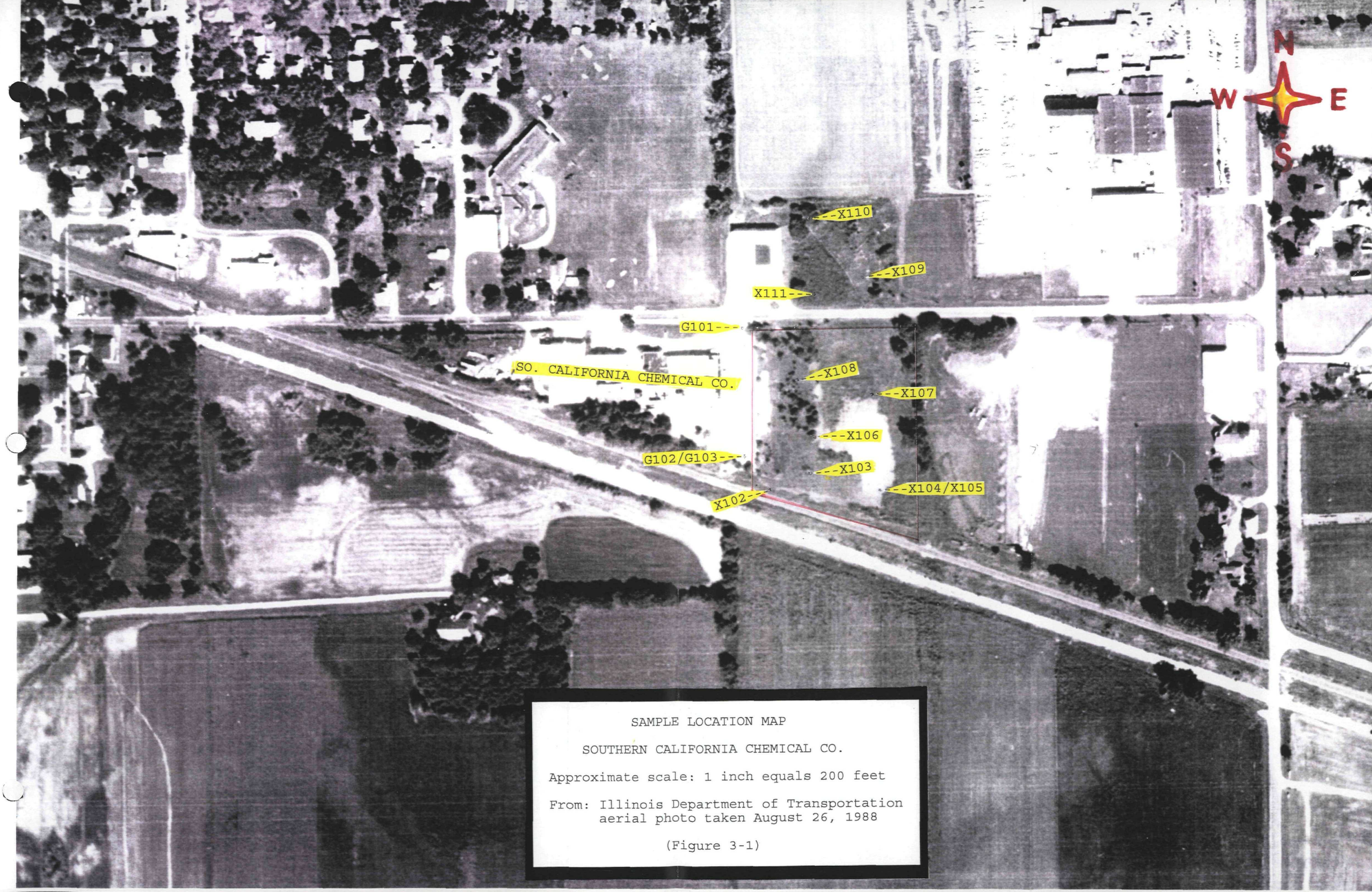
assurance review of the sample analysis was performed by Lockheed Corporation, who is an Environmental Science Assistance Team Contractor for USEPA Region V. A final quality assurance review of the data packages was subsequently performed by the staff of Central Region Laboratories of USEPA Region V. The Target Compound Listing is provided in Appendix D of this report. Specific compound detection limits can be found in Appendix F (the analytical section) of this report. See figure 3-1 for specific sampling locations. Mr. Steve Salisbury and Ron Shacklee of Phibro-Tech split the monitoring well samples collected on the original Southern California Chemical Company property. They did not choose to spit samples collected off of their property.

Chemical analysis of the groundwater samples collected by the site inspection personnel revealed elevated concentrations of volatile, semivolatile and inorganic substances. Analysis of the ten soil samples collected during the inspection revealed elevated concentrations of volatiles, semivolatiles, pesticides, tentatively identified compounds and inorganic substances. See Table F-1 for the summary of the sample results. Complete laboratory analytical data for the samples are provided in Appendix F of this report.

3.8 KEY SAMPLES

Samples collected during the Integrated Site Assessment Inspection of the Southern California Chemical Company site indicate concentrations of contaminants at levels that are significantly above background at certain sampling points. The following tables list the key samples obtained during the Southern California Chemical Company Integrated Site Assessment inspection. For a more detailed sample analysis, refer to Table F-1 Sample Summary, located at the front of Volume 2 of this report.

(b) (9)



SAMPLE LOCATION MAP

SOUTHERN CALIFORNIA CHEMICAL CO.

Approximate scale: 1 inch equals 200 feet

From: Illinois Department of Transportation
aerial photo taken August 26, 1988

(Figure 3-1)

NAME: So. California Chemical Co.
ILD NUMBER 059483081

TABLE 3-3
KEY SAMPLES
(Soil)

SAMPLING POINT	X101		X102		X103		X104		X105		X106		X107		X108		X109		X110		X111	
	5-5-94		5-4-94		5-4-94		5-4-94		5-4-94		5-5-94		5-5-94		5-5-94		5-5-94		5-5-94		5-5-94	
PARAMETER	(Background)								(Duplicate)													
VOLATILES																						
Tetrachloroethene	11.00	U	--		2.00	J	--		--		2.00	J	--		--		--		--		--	
Ethylbenzene	11.00	U	--		0.60	J	--		--		--		--		--		--		--		--	
Xylene(total)	11.00	U	--		3.00	J	2.00	J	2.00	J	--		--		--		--		--		--	
	ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg	
SEMIVOLATILES																						
Isophorone	370.00	U	--		810.00		--		--		--		--		--		--		--		--	
Phenanthrene	370.00	U	--		250.00	J	--		--		--		--		--		--		--		31.00	J
Anthracene	370.00	U	--		32.00	J	--		--		--		--		--		--		--		--	
Di-n-Butylphthalate	370.00	U	--		47.00	J	--		--		--		--		--		--		--		--	
Fluoranthene	370.00	U	--		320.00	J	--		--		--		--		--		--		--		54.00	J
Pyrene	370.00	U	--		250.00	J	--		--		--		--		--		--		--		45.00	J
Benzo(a)anthracene	370.00	U	--		150.00	J	--		--		--		--		--		--		--		--	
Chrysene	370.00	U	--		150.00	J	--		--		--		--		--		--		--		--	
bis(2-Ethylhexyl)phthalate	21.00	J	--		--		--		--		74.00	J	--		--		--		250.00	J	--	
Benzo(b)fluoranthene	370.00	U	--		150.00	J	--		--		--		--		--		--		--		--	
Benzo(k)fluoranthene	370.00	U	--		120.00	J	--		--		--		--		--		--		--		--	
Benzo(a)pyrene	370.00	U	--		120.00	J	--		--		--		--		--		--		--		--	
Indeno(1,2,3-cd)pyrene	370.00	U	--		94.00	J	--		--		--		--		--		--		--		--	
Benzo(g,h,i)perylene	370.00	U	--		100.00	J	--		--		--		--		--		--		--		--	
	ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg	
TENTATIVELY IDENTIFIED COMPOUNDS																						
Phosphoric acid, dioctadecyl	--		--		--		--		--		760.00	NJ	--		--		--		--		--	
.gamma.-Sitositol	--		--		--		--		--		910.00	NJ	--		--		--		--		--	
Benzo(e)pyrene	--		--		490.00	NJ	--		--		--		--		--		--		--		--	
	ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg	
PESTICIDES																						
Heptachlor	1.90	U	--		5.10	P	--		2.60		--		--		--		--		--		--	
4,4'-DDE	3.70	U	--		6.10		--		--		--		--		--		--		--		--	
Endrin	3.70	U	--		--		--		--		6.20	P	--		--		--		--		--	
4,4'-DDD	3.70	U	--		9.10		--		--		--		--		--		--		--		--	
4,4'-DDT	3.70	U	--		6.80	P	--		--		--		--		--		--		--		--	
Endrin aldehyde	3.70	U	--		8.60	P	--		--		6.40		--		--		--		--		--	
Aroclor-1248	37.00	U	--		120.00		--		--		--		--		--		--		--		--	
Aroclor-1254	37.00	U	--		240.00	P	--		--		--		--		--		--		--		--	
	ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg		ug/Kg	
INORGANICS																						
Beryllium	0.44	B	--		--		--		--		3.40		--		--		--		--		--	
Cadmium	0.89	U	--		--		--		--		2.80		--		--		--		--		--	
Calcium	1430.00		--		33000.00		--		--		64100.00		--		--		--		--		--	
Chromium	14.10		55.40		1090.00		--		--		1150.00		--		--		--		--		--	
Cobalt	6.90	B	--		22.80		--		--		--		--		--		--		--		--	
Copper	8.00		1060.00		22400.00		1050.00		1110.00		35400.00		458.00		232.00		29.50		167.00		--	
Iron	12400.00		--		52100.00		--		--		--		--		--		--		--		--	
Lead	10.70		--		71.40		--		--		113.00		--		--		--		--		--	
Magnesium	1800.00		--		19000.00		--		--		41600.00		--		--		--		--		--	
Nickel	7.10	B	--		72.00		--		--		37.10		--		--		--		--		--	
Silver	0.64	U	--		2.80		--		--		1.10	B	--		--		--		--		--	
Sodium	31.40	B	--		--		--		--		131.00	B	--		--		--		--		--	
Zinc	35.50		--		215.00		--		--		170.00		--		--		--		--		--	
Cyanide	0.57	U	--		0.68		--		--		3.00		0.89		1.50		--		--		--	
	mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg		mg/Kg	

NAME: So. California Chemical Co.
ILD NUMBER 059483081

TABLE 3-3
KEY SAMPLES
(Groundwater)

SAMPLING POINT / PARAMETER	G501 5-4-94 (Background)	G101 5-4-94	G102 5-4-94	G103 5-4-94 (Duplicate)	G502 5-4-94 (Duplicate)
VOLATILES					
Methylene Chloride	1.00 J	8.00 J	7.00 J	12.00	1.00
	ug/L	ug/L	ug/L	ug/L	ug/L
SEMIVOLATILES					
bis(2-Ethylhexyl)phthalate	2.00 UJ	3.00 J	--	--	--
	ug/L	ug/L	ug/L	ug/L	ug/L
TENTATIVELY IDENTIFIED COMPOUNDS					
Disulfide, dimethyl	--	--	--	8.0 NJ	--
	ug/L	ug/L	ug/L	ug/L	ug/L
PESTICIDES					
INORGANICS					
Arsenic	2.00 U	7.60 B	5.90 B	5.90 B	--
Calcium	59800.00	226000.00	--	--	60000.00
Iron	269.00	10000.00	2930.00	1880.00	278.00
Magnesium	30600.00	119000.00	35500.00	35200.00	30600.00
Manganese	6.00 U	57.40	36.30	35.40	--
Nickel	18.00 U	31.30 B	--	--	--
Potassium	6100.00 U	8340.00	969.00 B	811.00 B	--
Selenium	2.00 U	4.30 B	--	1.10 B	--
Sodium	15600.00	578000.00	--	--	27400.00
Thallium	2.00 U	0.90 B	--	1.10 B	--
Zinc	49.00 U	10.60 B	3.30 B	4.10 B	--
	ug/L	ug/L	ug/L	ug/L	ug/L

TARGET COMPOUND LIST

Volatile Target Compounds

Chloromethane	1,2-Dichloropropane
Bromomethane	cis-1,3-Dichloropropene
Vinyl Chlorde	Trichloroethene
Chloroethane	Dibromochloromethane
Methylene Chloride	1,1,2-Trichloroethane
Acetone	Benzene
Carbon Disulfide	trans-1,3-Dichloropropene
1,1-Dichloroethene	Bromoform
1,1-Dichloroethane	4-Methyl-2-pentanone
1,2-Dichloroehtene (total)	2-Hexanone
Chloroform	Tetrachloroethene
1,2-Dichloroethane	1,1,2,2-Tetrachloroethane
2-Butanone	Toluene
1,1,1-Trichloroethane	Chlorobenzene
Carbon Tetrachloride	Ethylbenzene
Vinyl Acetate	Styrene
Bromodichloromethane	Xylenes (total)

Base/Neutral Target Compounds

Hexachloroethane	2,4-Dinitrotoluene
bis(2-Chloroethyl) Ether	Diethylphthalate
Benzyl Alcohol	N-Nitrosodiphenylamine
bis (2-Chloroisopropyl) Ether	Hexachlorobenzene
N-Nitroso-Di-n-Propylamine	Phenanthrene
Nitrobenzene	4-Bromophenyl-phenylether
Hexachlorobutadiene	Anthracene

2-Methylnaphthalene	Di-n-Butylphthalate
1,2,4-Trichlorobenzene	Fluoranthene
Isophorone	Pyrene
Naphthalene	Butylbenzylphthalate
4-Chloroaniline	bis(2-Ethylhexyl)Phthalate
bis(2-chloroethoxy)Methane	Chrysene
Hexachlorocyclopentadiene	Benzo(a)Anthracene
2-Chloronaphthalene	3-3'-Dichlorobenzidene
2-Nitroaniline	Di-n-Octyl Phthalate
Acenaphthylene	Benzo(b)Fluoranthene
3-Nitroaniline	Benzo(k)Fluoranthene
Acenaphthene	Benzo(a)Pyrene
Dibenzofuran	Ideno(1,2,3-cd)Pyrene
Dimethyl Phthalate	Dibenz(a,h)Anthracene
2,6-Dinitrotoluene	Benzo(g,h,i)Perylene
Fluorene	1,2-Dichlorobenzene
4-Nitroaniline	1,3-Dichlorobenzene
4-Chlorophenyl-phenylether	1,4-Dichlorobenzene

Acid Target Compounds

Benzoic Acid	2,4,6-Trichlorophenol
Phenol	2,4,5-Trichlorophenol
2-Chlorophenol	4-Chloro-3-methylphenol
2-Nitrophenol	2,4-Dinitrophenol
2-Methylphenol	2-Methyl-4,6-dinitrophenol
2,4-Dimethylphenol	Pentachlorophenol
4-Methylphenol	4-Nitrophenol
2,4-Dichlorophenol	

Pesticide/PCB Target Compounds

alpha-BHC	Endrin Ketone
beta-BHC	Endosulfan Sulfate
delta-BHC	Methoxychlor
gamma-BHC (Lindane)	alpha-Chlordane
Heptachlor	gamma-Chlordane
Aldrin	Toxaphene
Heptachlor epoxide	Aroclor-1016
Endosulfan I	Aroclor-1221
4,4'-DDE	Aroclor-1232
Dieldrin	Aroclor-1242
Endrin	Aroclor-1248
4,4'-DDD	Aroclor-1254
Endosulfan II	Aroclor-1260
4,4'-DDT	

Inorganic Target Compounds

Aluminum	Manganese
Antimony	Mercury
Arsenic	Nickel
Barium	Potassium
Beryllium	Selenium
Cadmium	Silver
Calcium	Sodium
Chromium	Thallium
Cobolt	Vanadium
Copper	Zinc
Iron	Cyanide
Lead	Sulfide
Magnesium	

DATA QUALIFIERS

QUALIFIER	DEFINITION ORGANICS	DEFINITION INORGANICS
U	Compound was tested for but not detected. The sample quantitation limit must be corrected for dilution and for percent moisture. For soil samples subjected to GPC clean-up procedures, the CRQL is also multiplied by two, to account for the fact that only half of the extract is recovered.	Analyte was analyzed for but not detected.
J	Estimated value. Used when estimating a concentration for tentatively identified compounds (TICS) where a 1:1 response is assumed or when the mass spectral data indicate the presence of a compound that meets the identification criteria and the result is less than the sample quantitation limit but greater than zero. Used in data validation when the quality control data indicate that a value may not be accurate.	Estimated value. Used in data validation when the quality control data indicate that a value may not be accurate.
C	This flag applies to pesticide results where the identification is confirmed by GC/MS.	Method qualifier indicates analysis by the Manual Spectrophotometric method.
B	Analyte was found in the associated blank as well as in the sample. It indicates possible/probable blank contamination and warns the data user to take appropriate action.	The reported value is less than the CRDL but greater than the instrument detection limit (IDL).
D	Identifies all compounds identified in an analysis at a secondary dilution factor. If a sample or extract is re-analyzed at a higher dilution factor as in the "E" flag, the "DL" suffix is appended to the sample number on the Form I for the diluted sample, and all concentration values are flagged with the "D" flag.	Not used.
E	Identifies compounds whose concentrations exceed the calibration range for that specific analysis. All extracts containing compounds exceeding the calibration range must be diluted and analyzed again. If the dilution of the extract causes any compounds identified in the first analysis to be below the calibration range in the second analysis, then the results of both analyses must be reported on separate Forms I. The Form I for the diluted sample must have the "DL" suffix appended to the sample number.	The reported value is estimated because of the presence of interference.
A	This flag indicates that a TIC is a suspected aldol concentration product formed by the reaction of the solvents used to process the sample in the laboratory.	Method qualifier indicates analysis by Flame Atomic Absorption (AA).
M	Not used.	Duplicate injection (a QC parameter not met).

N	Not used	Spiked sample (a QC parameter not met).
S	Not used.	The reported value was determined by the Method of Standard Additions (MSA).
W	Not used.	Post digestion spike for Furnace AA analysis (a QC parameter) is out of control limits of 85% to 115% recovery, while sample absorbance is less than 50% of spike absorbance.
*	Not used.	Duplicate analysis (a QC parameter not within control limits).
+	Not used.	Correlation coefficient for MSA (a QC parameter) is less than 0.995.
P	Not used.	Method qualifier indicates analysis by ICP (Inductively Coupled Plasma) Spectroscopy.
CV	Not used.	Method qualifier indicates analysis by Cold Vapor AA.
AV	Not used.	Method qualifier indicates analysis by Automated Cold Vapor AA.
AS	Not used.	Method qualifier indicates analysis by Semi-Automated Cold Spectrophotometry.
T	Not used.	Method qualifier indicates Titrimetric analysis.
NR	The analyte was not required to be analyzed.	The analyte was not required to be analyzed.
R	Rejected data. The QC parameters indicate that the data is not usable for any purpose.	Rejected data. The QC parameters indicate that the data is not usable for any purpose.

4.0 IDENTIFICATION OF SOURCES

4.1 INTRODUCTION

In this section the author will briefly discuss the various hazardous waste sources which have been identified in the initial stages of the CERCLA Integrated Site Assessment inspection. Information concerning the size, volume and waste composition of each source has been derived throughout the initial site assessment, reconnaissance visits, and the screening site sampling action. It should be pointed out, however, that the total number and nature of each of the sources identified below may be subject to change. The site may be redefined as it progresses through the CERCLA site investigation program and receives further investigation.

4.2 AREA CONTAMINATED SOIL

Soil samples collected during the Integrated Site Assessment inspection indicate that there are areas of contaminated soil in the Southern California Chemical Company dump area property. The samples were collected at depths ranging from two to three feet but the depth to which the contamination reaches is unknown. Using a planimeter and an aerial photograph obtained from the Illinois Department of Transportation the area within the contaminated sampling points was measured and estimated to be approximately 75,000 square feet. The volatile contaminant found was Xylene (2.0 ppb) and metals include Copper (1,100 ppm) and Chromium (55.4 ppm). The origin of the contamination is believed to have

come from runoff from the dump area since it is at a higher elevation and would drain into the area of contaminated soil. The runoff from the source would flow across Jefferson Street and end in the wetland. The source does not have any man-made containment features.

4.3 DUMP AREA

Three soil samples were collected in the dump area located adjacent to the area used for manufacturing. These samples were collected at depths ranging from six inches to three and a half feet. Volatile contaminants include Tetrachloroethene (2.0 J ppb), Ethylbenzene (.6 J ppb) and Xylene (3.0 J ppb). Semivolatiles compounds include Isophorone (810.0 ppb), Phenanthrene (250.0 J ppb), Anthracene (32.0 J ppb), Di-n-Butylthalate (47.0 J ppb), Fluoranthene (320.0 J ppb), Pyrene (250.0 J ppb), Benzo(a)anthracene (150.0 J ppb), Chrysene (150.0 J ppb), bis(2-Ethylhexyl)phthalate (74.0 J ppb), Benzo(b)fluoranthene (150.0 J ppb), Benzo(k)fluoranthene (120.0 J ppb), Benzo(a)pyrene (120.0 J ppb), Indeno(1,2,3-cd)pyrene (94.0 J ppb) and Benzo(g,h,i)perylene (100.0 J ppb). Pesticides include Heptachlor (5.1 P ppb), 4,4'-DDE (6.1 ppb), Endrin (6.2 P ppb), 4,4'-DDD (9.1 ppb), 4,4'-DDT (6.8 P ppb), Endrin aldehyde (8.6 P ppb), Aroclor-1248 (120 ppb) and Aroclor-1254 (240 P ppb). Inorganic substances detected include Berylium (3.4 ppm), Cadmium (2.8 ppm), Chromium (1150.0 ppm), Cobalt (22.8 ppm), Copper (35,400.0 ppm), Lead (113.0 ppm),

Magnesium (41,600.0 ppm), Nickel (72.0 ppm), Zinc (215.0 ppm) and Cyanide (215.0 ppm). The origin of the source is dumping and burying of printed circuit boards an possibly other materials or substances. The source contains approximately 52,500 square feet and does not have any natural or man-made containment features.

4.5 POTENTIAL UNDETECTED SOURCES

Illinois Environmental Protection Agency files do not document the illegal dumping or burying of hazardous materials at the Southern California Chemical Company Dump Area site. However the potential exists that burying of hazardous materials or unreported spills may have occurred prior to or during the years the facility was in operation.

5.0 MIGRATION PATHWAYS

5.1 INTRODUCTION

The CERCLA Integrated Site Assessment program identifies three migration pathways and one exposure pathway by which hazardous substances may pose a threat to human health and/or the environment. Consequently, sites are evaluated on their known or potential impact to these four pathways. The pathways evaluated are groundwater migration, surface water migration, soil exposure, and air migration.

This section presents and discusses information collected during the CERCLA Integrated Site Assessment inspection of Southern California Chemical Company. This information, together with information documented in other sources, will be utilized in analyzing the site's impact on the four pathways and the various human and environmental targets within the established target distance limits.

Discussions of the pathways will include pathway descriptions, contaminant sources, and targets, such as human populations, fisheries, endangered species, wetlands and other sensitive environments.

5.2 GROUNDWATER

Groundwater samples were collected from two monitoring and one municipal wells. The results from the two monitoring wells indicate an observed release to groundwater that is attributable to the site. The compounds found three times

background or above detection limits are shown in the Key Sample Table 3-4 (Groundwater). Sampling location G501 represents the background well. There are two duplicate samples that were collected, G102/G103 and G501/G502. This was necessary since the monitoring well and municipal (drinking water) samples were sent to different laboratories.

There are three monitoring wells on the Southern California Chemical Company site that were installed by Dames & Moore in August, 1992. Groundwater elevations obtained from eight piezometers installed by Dames & Moore in August, 1988 suggest that the general groundwater flow is towards the northwest. The nearest residence known to use groundwater for drinking is located (b) (9) and the nearest municipal well is Union Well Number 4 which is a 760 feet deep well cased to 133 feet located (b) (9) (b) (9). Well Number 2 is a 192 feet deep well that is cased to 150 feet and located (b) (9) (b) (9).

Groundwater is widely used in the area. The village of Union (population 622) obtains all its drinking water from 2 active wells which pump from 2 different locations throughout the village. These wells supply approximately 53,000 gallons of water per day to 200 services. The geology of the area around the Southern California Chemical Company site consists of glacial drift which may be up to 145 feet thick overlying Ordovician bedrock. The Ordovician bedrock is composed of the Maquoketa Formation, which is a shale with

interbeded dolomite, overlying the Galena Platville Dolomite which is underlain by the St. Peter Sandstone. Groundwater is obtained locally from both the glacial and sandstone aquifers. The number of people who use groundwater in a 4-mile radius of the site was estimated using USGS topographic maps and the average persons per household in McHenry County. The estimated population is:

Distance (miles)	Population
0 to 1/4	6
>1/4 to 1/2	625
>1/2 to 1	41
>1 to 2	294
>2 to 3	434
>3 to 4	3,774

5.3 SURFACE WATER

No surface water samples were collected during the May 4 and 5, 1994 Integrated Site Assessment inspection of the Southern California Chemical Company site. The property is flat with no noticeable overland flow route to surface water and drainage from the site would flow north across Jefferson Street into a wetland area. The wetland has no outlet and any standing water would eventually evaporate and/or soak into the soil. The wetland is not considered to be perennial since it only contains water on a temporary basis. The 15-mile surface water route was not evaluated

since there is no known Probable Point of Entry of runoff from the site into surface water.

5.4 AIR PATHWAY

No documented releases to the air were observed in the breathing zone during the CERCLA Integrated Site Assessment inspection while samples were being collected. HNU photo-ionization detector readings with a 11.7 eV lamp were taken during sample collection but no readings above background were observed. The potential for the wind to carry contaminants off-site is possible since contaminants were found in the top six inches of soil onsite.

The Southern California Chemical Company facility property is currently vacant and security consists of locked gates and doors. The site does have a custodian during the day and contains fencing around the site. The dump area is fenced along the west and north sides but access can be gained via the east and south sides. The property is located in the southeastern edge of Union and has commercial businesses to the north and northeasteast across Jefferson Street and private residences lie west. Evergreen Park School is located northwest across Jefferson Street. No schools or daycare facilities are located within 200 feet of any contaminated areas. There are aproximately 4,887 people who live within a four mile radius of the site. The estimated population potential for release in a 4-mile radius of the site is:

Distance (miles)	Population
Onsite	1
0 to 1/4	68
>1/4 to 1/2	127
>1/2 to 1	476
>1 to 2	294
>2 to 3	434
>3 to 4	3,487

5.5 SOIL EXPOSURE PATHWAY

Soil samples taken during the Integrated Site Assessment inspection document areas of observed contamination by contaminants that are attributable to the site. The dump area is readily accessible from the east and south sides to trespassers. During the inspection tire tracks from All Terrain Vehicles were seen in the wetland area in the dump area. The nearest individual (residence) is located approximately 800 feet west and the nearest school, Evergreen Park School, is located north of the site directly across Jefferson Street. A review of USGS topographic maps, city maps and U.S. Census data indicate that approximately 673 people live within a one-mile radius of the site. The estimated population within one mile of the site is:

Distance (miles)	Population
Onsite	1
0 to 1/4	68

>1/4 to 1/2	127
>1/2 to 1	476

According to the Illinois Department of Conservation there are no terrestrial sensitive environments near the Southern California Chemical Company site. Wetland Inventory Maps indicate there are 7 acres of wetlands within a half mile radius of the site.

6.0 BIBLIOGRAPHY

Illinois Environmental Protection Agency, 1989. Site Preliminary Assessment for Southern California Chemical Company, ILD 059483081, prepared by Kenneth Corkill, Springfield, Illinois.

Illinois Department of Public Health well construction reports/Geological Water Survey well records for the Union area.

Illinois Environmental Protection Agency, Division of Public Water Supplies. Well Inventory Sheets for City of Union.

Illinois Department of Conservation. Review of Sensitive Environment Locations letter of July 12, 1994 for Southern California Chemical Company.

United States Department of the Interior, National Wetlands Inventory Maps for Marengo South, IL. Quadrangles, 7.5 Minute Series.

Flood Insurance Rate Map, August 15, 1983 for the village of Union, Ill. Federal Emergency Management Agency.

USGS, 1975, Marengo North, IL. Quadrangle, 7.5 Minute Series.

USGS, 1981, Woodstock, IL. Quadrangle, 7.5 Minute Series.

USGS, 1975, Marengo South, IL. Quadrangle, 7.5 Minute Series.

USGS, 1972, Huntley, IL. Quadrangle, 7.5 Minute Series.

IEPA Site Reconnaissance Visit of March 30, 1994 to Southern California Chemical Company, Union, Il.

APPENDIX A

SITE 4-MILE RADIUS MAP

SOUTHERN CALIFORNIA CHEMICAL COMPANY

SDMS US EPA Region V

Imagery Insert Form

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4-MILE RADIUS MAP

☐ **Other:**

APPENDIX B

SURFACE WATER ROUTE MAP

SDMS US EPA Region V

Imagery Insert Form

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15-MILE SURFACE WATER MAP

☐ **Other:**

APPENDIX C

U.S. EPA FORM 2070-13

Site Inspection Report

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 1 - SITE LOCATION AND INSPECTION INFORMATION

EPA

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD059483081

II. SITE NAME AND LOCATION

01 SITE NAME	02 STREET, ROUTE NO., OR SPECIFIC LOCATION IDENTIFIER
S. CALIFORNIA CHEMICAL	17415 E. JEFFERSON STREET

03 CITY	04 STATE	05 ZIP CODE	06 COUNTY	07 COUNTY CODE	08 CONG. DIST.
UNION	IL	60180	McHENRY	111	12

09 COORDINATES LATITUDE	LONGITUDE
42 13 55.2	088 32 04.8

10 TYPE OF OWNERSHIP (Check one)
☒ A. PRIVATE ☐ B. FEDERAL _____ ☐ C. STATE ☐ D. COUNTY ☐ E. MUNICIPAL
☐ F. OTHER _____ ☐ G. UNKNOWN

III. INSPECTION INFORMATION

01 DATE OF INSPECTION (MONTH DAY YEAR)	02 SITE STATUS	03 YEARS OF OPERATION
5 4 94	☐ ACTIVE ☒ INACTIVE	1972 (BEGINNING YEAR) 1988 (ENDING YEAR) ☐ UNKNOWN

04 AGENCY PERFORMING INSPECTION (Check all that apply)
☐ A. EPA ☐ B. EPA CONTRACTOR _____ (Name of firm) ☐ C. MUNICIPAL ☐ D. MUNICIPAL CONTRACTOR _____ (Name of firm)
☒ E. STATE ☐ F. STATE CONTRACTOR _____ (Name of firm) ☐ G. OTHER _____ (Specify)

05 CHIEF INSPECTOR	06 TITLE	07 ORGANIZATION	08 TELEPHONE NO
ROBERT CASPER	EPS	IEPA	(217) 782-6761
09 OTHER INSPECTORS	10 TITLE	11 ORGANIZATION	12 TELEPHONE NO.
PETER SORENSEN	EPS	IEPA	(217) 782-6761
MARK WEBER	EPS	IEPA	(217) 782-6761
GREG SPENCER	EPS	IEPA	(217) 782-6761
			( )
			( )

13 SITE REPRESENTATIVES INTERVIEWED	14 TITLE	15 ADDRESS	16 TELEPHONE NO
STEVE SALISBURY	ENVIRONMENTAL HEALTH & SAFETY MANAGER	10 INDUSTRY AVE, JOLIET, IL	(815) 727-3010
RON SHACKLEE	CUSTODIAN	17415 E. JEFFERSON STREET UNION, IL	( )
			( )
			( )
			( )
			( )

17 ACCESS GAINED BY (Check one)	18 TIME OF INSPECTION	19 WEATHER CONDITIONS
☒ PERMISSION ☐ WARRANT	9:45 AM	50°F, SUNNY, SLIGHT BREEZE

IV. INFORMATION AVAILABLE FROM

01 CONTACT	02 OF (Agency/Organization)	03 TELEPHONE NO
		( )

04 PERSON RESPONSIBLE FOR SITE INSPECTION FORM	05 AGENCY	06 ORGANIZATION	07 TELEPHONE NO.	08 DATE (MONTH DAY YEAR)
ROBERT CASPER	IEPA	BOL/RPMS	217-782-6761	8 24 94

EPA FORM 2070-13 (7-81)

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 2 - WASTE INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	IL D 059 483 081

II. WASTE STATES, QUANTITIES, AND CHARACTERISTICS

01 PHYSICAL STATES (Check all that apply)

- [X] A. SOLID
- [ ] B. POWDER, FINES
- [ ] C. SLUDGE
- [ ] D. OTHER _____ (Specify)
- [ ] E. SLURRY
- [ ] F. LIQUID
- [ ] G. GAS

02 WASTE QUANTITY AT SITE (Measures of waste quantities must be independent)

TONS _____

CUBIC YARDS _____

NO. OF DRUMS _____

03 WASTE CHARACTERISTICS (Check all that apply)

- [X] A. TOXIC
- [ ] B. CORROSIVE
- [ ] C. RADIOACTIVE
- [X] D. PERSISTENT
- [ ] E. SOLUBLE
- [ ] F. INFECTIOUS
- [ ] G. FLAMMABLE
- [ ] H. IGNITABLE
- [ ] I. HIGHLY VOLATILE
- [ ] J. EXPLOSIVE
- [ ] K. REACTIVE
- [ ] L. INCOMPATIBLE
- [ ] M. NOT APPLICABLE

III. WASTE TYPE

CATEGORY	SUBSTANCE NAME	01 GROSS AMOUNT	02 UNIT OF MEASURE	03 COMMENTS
SLU	SLUDGE			
OLW	OILY WASTE			
SOL	SOLVENTS	UNKOWN	—	
PSD	PESTICIDES	UNKNOWN	—	
OCC	OTHER ORGANIC CHEMICALS	UNKNOWN	—	SEMI VOLATILES
IOC	INORGANIC CHEMICALS	UNKNOWN	—	CYANIDE
ACD	ACIDS			
BAS	BASES			
MES	HEAVY METALS	UNKNOWN		

IV. HAZARDOUS SUBSTANCES (See Appendix for most frequently cited CAS Numbers)

01 CATEGORY	02 SUBSTANCE NAME	03 CAS NUMBER	04 STORAGE/DISPOSAL METHOD	05 CONCENTRATION	06 MEASURE OF CONCENTRATION
SOL	TETRACHLOROETHENE		SOIL	2 J	PPb
SOL	XYLENE (TOTAL)		SOIL	3 J	PPb
OCC	ISOPHORONE		SOIL	810	PPb
OCC	PHENANTHRENE		SOIL	250 J	PPb
OCC	FLUORANTHENE		SOIL	320 J	PPb
OCC	PYRENE		SOIL	250 J	PPb
OCC	CHRYSENE		SOIL	150 J	PPb
OCC	BENZO(b) FLUORANTHENE		SOIL	150 J	PPb
OCC	BENZO (a) PYRENE		SOIL	120 J	PPb
PSD	ARUCLOR - 1248		SOIL	120	PPb
PSD	ARUCLOR - 1254		SOIL	240 P	PPb
MES	CHROMIUM		SOIL	1150	PPM
MES	COPPER		SOIL	35400	PPM
MES	LEAD		SOIL	215	PPM
IOC	CYANIDE		SOIL	3	PPM
MES	ZINC		SOIL	215	PPM

V. FEEDSTOCKS (See Appendix for CAS Numbers)

CATEGORY	01 FEEDSTOCK NAME	02 CAS NUMBER	CATEGORY	01 FEEDSTOCK NAME	02 CAS NUMBER
FDS			FDS		
FDS			FDS		
FDS			FDS		
FDS			FDS		

VI. SOURCES OF INFORMATION (Cite specific references, e.g. state files, sampling analysis reports)

SITE REPRESENTATIVE INTERVIEWS

IEPA SITE INSPECTION ON 5-425-9# AND ANALYTICAL RESULTS.

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

II. HAZARDOUS CONDITIONS AND INCIDENTS

01 [X] A. GROUNDWATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: 5174
02 ☐ OBSERVED (DATE: 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION
ALL AREA DRINKING WATER IS OBTAINED FROM GROUNDWATER. MONITOR WELL SAMPLES COLLECTED ON 5-4-94 INDICATE LOW LEVELS OF METHYLENE CHLORIDE, bis(2-ETHYLHEXYL)PHTHALATE AND METALS ARE PRESENT.

01 ☐ B. SURFACE WATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ C. CONTAMINATION OF AIR
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ D. FIRE/EXPLOSIVE CONDITIONS
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 [X] E. DIRECT CONTACT
03 POPULATION POTENTIALLY AFFECTED: 4,886
02 ☐ OBSERVED (DATE: 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION
SOIL SAMPLES INDICATE SEMIVOLATILES, VOLATILES, PESTICIDES AND INORGANIC SUBSTANCES ARE PRESENT IN THE DUMP AREA AT A DEPTH OF 6-8 INCHES.

01 [X] F. CONTAMINATION OF SOIL
03 AREA POTENTIALLY AFFECTED: 5 (ACRES)
02 ☐ OBSERVED (DATE: 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION
SOIL IN THE DUMP AREA WAS FOUND TO CONTAIN VOLATILES, SEMIVOLATILE PESTICIDES, TENTATIVELY IDENTIFIED COMPOUNDS AND INORGANIC CONTAMINANTS.

01 [X] G. DRINKING WATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: 5174
02 ☐ OBSERVED (DATE: _____) [X] POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
ALL DRINKING WATER IN THE AREA IS OBTAINED FROM GROUNDWATER

01 [X] H. WORKER EXPOSURE/INJURY
03 WORKERS POTENTIALLY AFFECTED: 1
02 ☐ OBSERVED (DATE: _____) [X] POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
SITE IS CLOSED AND HAS ONE CUSTODIAN ONSITE.

01 ☐ I. POPULATION EXPOSURE/INJURY
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE: _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION
01 STATE: IL | 02 SITE NUMBER: ILD 059483081

II. HAZARDOUS CONDITIONS AND INCIDENTS (Continued)

01 [X] J. DAMAGE TO FLORA — 02 ☐ OBSERVED (DATE _____) — [X] POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
PORTIONS OF THE PROPERTY AND DRAINAGE OFFSITE IS CLASSIFIED AS A WETLAND. PROPERTY HAS BARE GROUND AREAS.

01 ☐ K. DAMAGE TO FAUNA — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION (Include names(s) of species)
NONE -

01 ☐ L. CONTAMINATION OF FOOD CHAIN — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ M. UNSTABLE CONTAINMENT OF WASTES (Spills, Runoff, Standing liquids, Leaking drums) — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
03 POPULATION POTENTIALLY AFFECTED: _____ — 04 NARRATIVE DESCRIPTION
NONE

01 [X] N. DAMAGE TO OFFSITE PROPERTY — 02 ☐ OBSERVED (DATE _____) — [X] POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
WETLAND AREA THAT DRAINS THE PROPERTY HAD ELEVATED LEVELS OF COPPER.

01 ☐ O. CONTAMINATION OF SEWERS, STORM DRAINS, WWTPs — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ P. ILLEGAL/UNAUTHORIZED DUMPING — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

05 DESCRIPTION OF ANY OTHER KNOWN, POTENTIAL, OR ALLEGED HAZARDS
NONE

III. TOTAL POPULATION POTENTIALLY AFFECTED: 5174

IV. COMMENTS

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)
SITE RECON VISIT
SITE INSPECTION OF 5-4 & 5-94

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION
PART 4 - PERMIT AND DESCRIPTIVE INFORMATION

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

II. PERMIT INFORMATION

01 TYPE OF PERMIT ISSUED (Check all that apply)	02 PERMIT NUMBER	03 DATE ISSUED	04 EXPIRATION DATE	05 COMMENTS
☐ A. NPDES				
☐ B. UIC				
☐ C. AIR				
☐ D. RCRA				
☐ E. RCRA INTERIM STATUS				
☐ F. SPCC PLAN				
☐ G. STATE (Specify)				
☐ H. LOCAL (Specify)				
☐ I. OTHER (Specify)				
☒ J. NONE				UNDERGOING RCRA CLOSURE

III. SITE DESCRIPTION

01 STORAGE/DISPOSAL (Check all that apply)	02 AMOUNT	03 UNIT OF MEASURE
☐ A. SURFACE IMPOUNDMENT		
☒ B. PILES	UNKNOWN	
☐ C. DRUMS, ABOVE GROUND		
☐ D. TANK, ABOVE GROUND		
☐ E. TANK, BELOW GROUND		
☐ F. LANDFILL		
☐ G. LANDFARM		
☐ H. OPEN DUMP		
☐ I. OTHER (Specify)		

04 TREATMENT (Check all that apply)

- ☐ A. INCINERATION
- ☐ B. UNDERGROUND INJECTION
- ☐ C. CHEMICAL/PHYSICAL
- ☐ D. BIOLOGICAL
- ☐ E. WASTE OIL PROCESSING
- ☐ F. SOLVENT RECOVERY
- ☐ G. OTHER RECYCLING/RECOVERY
- ☐ H. OTHER (Specify)

05 OTHER

- ☐ A. BUILDINGS ON SITE

06 AREA OF SITE

5 (Acres)

07 COMMENTS

SITE HAS BEEN CLOSED SINCE 1988. DUMP AREA IS NOT OWNED BY SOUTHERN CALIFORNIA CHEMICAL CO.

IV. CONTAINMENT

01 CONTAINMENT OF WASTES (Check one)

☐ A. ADEQUATE, SECURE ☐ B. MODERATE ☒ C. INADEQUATE, POOR ☐ D. INSECURE, UNSOUND, DANGEROUS

02 DESCRIPTION OF DRUMS, DIKING, LINERS, BARRIERS, ETC.

LANDFILL AREA HAS PILES OF DIRT AND EXPOSED ELECTRONIC PRINTED CIRCUIT BOARDS.

V. ACCESSIBILITY

01 WASTE EASILY ACCESSIBLE ☒ YES ☐ NO

02 COMMENTS

SITE IS NOT FENCED ON THE EAST OR SOUTH SIDES.

VI. SOURCES OF INFORMATION (Cite specific references, e.g. state files, sample analysis, reports)

IEPA FILES
SITE RECON
SITE INSPECTION OF 5-4-94

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 5 - WATER, DEMOGRAPHIC, AND ENVIRONMENTAL DATA

I. IDENTIFICATION
01 STATE: IL | 02 SITE NUMBER: ILD 059 483 081

II. DRINKING WATER SUPPLY

01 TYPE OF DRINKING SUPPLY	SURFACE	WELL
COMMUNITY	A. ☐	B. ☒
NON-COMMUNITY	C. ☐	D. ☒

02 STATUS	ENDANGERED	AFFECTED	MONITORED
	A. ☒	B. ☐	C. ☐
	D. ☒	E. ☐	F. ☐

03 DISTANCE TO SITE
A. .28 (mi)
B. .17 (mi)

III. GROUNDWATER

01 GROUNDWATER USE IN VICINITY
☒ A. ONLY SOURCE FOR DRINKING ☐ B. DRINKING (Other sources available) COMMERCIAL, INDUSTRIAL, IRRIGATION (No other water sources available) ☐ C. COMMERCIAL, INDUSTRIAL, IRRIGATION (Limited other sources available) ☐ D. NOT USED, UNUSEABLE

02 POPULATION SERVED BY GROUND WATER: 5174
03 DISTANCE TO NEAREST DRINKING WATER WELL: .17 (mi)

04 DEPTH TO GROUNDWATER	05 DIRECTION OF GROUNDWATER FLOW	06 DEPTH TO AQUIFER OF CONCERN	07 POTENTIAL YIELD OF AQUIFER	08 SOLE SOURCE AQUIFER
20 (ft)	NORTHWEST	20 (ft)	— (gpd)	☐ YES ☒ NO

09 DESCRIPTION OF WELLS (including usage, depth, and location relative to population and buildings)
UNION WELL 2 - 192' DEEP USING SHALLOW BEDROCK AQUIFER, LOCATED (b) (9) [redacted]
UNION WELL 4 - 760' DEEP USING SANDSTONE AQUIFER, LOCATED (b) (9) [redacted]
RESIDENTIAL WELLS - USE GLACIAL DRIFT & BEDROCK AQUIFERS

10 RECHARGE AREA	COMMENTS	11 DISCHARGE AREA	COMMENTS
☐ YES ☐ NO		☐ YES ☐ NO	

IV. SURFACE WATER

01 SURFACE WATER USE
☐ A. RESERVOIR, RECREATION, DRINKING WATER SOURCE ☐ B. IRRIGATION, ECONOMICALLY IMPORTANT RESOURCES ☐ C. COMMERCIAL, INDUSTRIAL ☒ D. NOT CURRENTLY USED

02 AFFECTED/POTENTIALLY AFFECTED BODIES OF WATER

NAME	AFFECTED	DISTANCE TO SITE
NONE	☐	(mi)
	☐	(mi)
	☐	(mi)

V. DEMOGRAPHIC AND PROPERTY INFORMATION

01 TOTAL POPULATION WITHIN

ONE (1) MILE OF SITE	TWO (2) MILES OF SITE	THREE (3) MILES OF SITE
A. 672 (NO OF PERSONS)	B. 966 (NO OF PERSONS)	C. 1400 (NO OF PERSONS)

02 DISTANCE TO NEAREST POPULATION: .1 (mi)

03 NUMBER OF BUILDINGS WITHIN TWO (2) MILES OF SITE	04 DISTANCE TO NEAREST OFF-SITE BUILDING
—	.02 (mi)

05 POPULATION WITHIN VICINITY OF SITE (Provide narrative description of nature of population within vicinity of site (e.g., rural, village, densely populated urban area))
VILLAGE OF UNION LIES WEST WITH SITE BEING LOCATED ON THE FRINGE OF TOWN LIMITS. NORTH AND NORTHEAST ARE COMMERCIAL BUSINESSES WITH FARMLAND SURROUNDING SITE ON EAST & SOUTH SIDES.

APPENDIX C

U.S. EPA FORM 2070-13

Site Inspection Report

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 1 - SITE LOCATION AND INSPECTION INFORMATION

EPA

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD059483081

II. SITE NAME AND LOCATION

01 SITE NAME (Legal, common, or descriptive name of site)	02 STREET, ROUTE NO., OR SPECIFIC LOCATION IDENTIFIER
S. CALIFORNIA CHEMICAL	17415 E. JEFFERSON STREET

03 CITY	04 STATE	05 ZIP CODE	06 COUNTY	07 COUNTY CODE	08 CONG. DIST.
UNION	IL	60180	McHENRY	111	12

09 COORDINATES LATITUDE	LONGITUDE
42 13 55.2	088 32 04.8

10 TYPE OF OWNERSHIP (Check one)
☒ A. PRIVATE ☐ B. FEDERAL _____ ☐ C. STATE ☐ D. COUNTY ☐ E. MUNICIPAL
☐ F. OTHER _____ ☐ G. UNKNOWN

III. INSPECTION INFORMATION

01 DATE OF INSPECTION (MONTH DAY YEAR)	02 SITE STATUS	03 YEARS OF OPERATION (BEGINNING YEAR / ENDING YEAR)
5 4 94	☐ ACTIVE ☒ INACTIVE	1972 / 1988 ☐ UNKNOWN

04 AGENCY PERFORMING INSPECTION (Check all that apply)
☐ A. EPA ☐ B. EPA CONTRACTOR _____ (Name of firm) ☐ C. MUNICIPAL ☐ D. MUNICIPAL CONTRACTOR _____ (Name of firm)
☒ E. STATE ☐ F. STATE CONTRACTOR _____ (Name of firm) ☐ G. OTHER _____ (Specify)

05 CHIEF INSPECTOR	06 TITLE	07 ORGANIZATION	08 TELEPHONE NO
ROBERT CASPER	EPS	IEPA	(217) 782-6761
09 OTHER INSPECTORS	10 TITLE	11 ORGANIZATION	12 TELEPHONE NO.
PETER SORENSEN	EPS	IEPA	(217) 782-6761
MARK WEBER	EPS	IEPA	(217) 782-6761
GREG SPENCER	EPS	IEPA	(217) 782-6761
			( )
			( )

13 SITE REPRESENTATIVES INTERVIEWED	14 TITLE	15 ADDRESS	16 TELEPHONE NO
STEVE SALISBURY	ENVIRONMENTAL HEALTH & SAFETY MANAGER	10 INDUSTRY AVE, JOLIET, IL	(815) 727-3010
RON SHACKLEE	CUSTODIAN	17415 E. JEFFERSON STREET UNION, IL	( )
			( )
			( )
			( )
			( )

17 ACCESS GAINED BY (Check one)	18 TIME OF INSPECTION	19 WEATHER CONDITIONS
☒ PERMISSION ☐ WARRANT	9:45 AM	50°F, SUNNY, SLIGHT BREEZE

IV. INFORMATION AVAILABLE FROM

01 CONTACT	02 OF (Agency/Organization)	03 TELEPHONE NO
		( )

04 PERSON RESPONSIBLE FOR SITE INSPECTION FORM	05 AGENCY	06 ORGANIZATION	07 TELEPHONE NO.	08 DATE (MONTH DAY YEAR)
ROBERT CASPER	IEPA	BOL/RPMS	217-782-6761	8 24 94

EPA FORM 2070-13 (7-81)

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 2 - WASTE INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	IL D 059 483 081

II. WASTE STATES, QUANTITIES, AND CHARACTERISTICS

01 PHYSICAL STATES (Check all that apply)

- [X] A. SOLID
- [ ] B. POWDER, FINES
- [ ] C. SLUDGE
- [ ] D. OTHER (Specify)
- [ ] E. SLURRY
- [ ] F. LIQUID
- [ ] G. GAS

02 WASTE QUANTITY AT SITE (Measures of waste quantities must be independent)

TONS: _____

CUBIC YARDS: _____

NO. OF DRUMS: _____

03 WASTE CHARACTERISTICS (Check all that apply)

- [X] A. TOXIC
- [ ] B. CORROSIVE
- [ ] C. RADIOACTIVE
- [X] D. PERSISTENT
- [ ] E. SOLUBLE
- [ ] F. INFECTIOUS
- [ ] G. FLAMMABLE
- [ ] H. IGNITABLE
- [ ] I. HIGHLY VOLATILE
- [ ] J. EXPLOSIVE
- [ ] K. REACTIVE
- [ ] L. INCOMPATIBLE
- [ ] M. NOT APPLICABLE

III. WASTE TYPE

CATEGORY	SUBSTANCE NAME	01 GROSS AMOUNT	02 UNIT OF MEASURE	03 COMMENTS
SLU	SLUDGE			
OLW	OILY WASTE			
SOL	SOLVENTS	UNKNOWN	—	
PSD	PESTICIDES	UNKNOWN	—	
OCC	OTHER ORGANIC CHEMICALS	UNKNOWN	—	SEMI VOLATILES
IOC	INORGANIC CHEMICALS	UNKNOWN	—	CYANIDE
ACD	ACIDS			
BAS	BASES			
MES	HEAVY METALS	UNKNOWN		

IV. HAZARDOUS SUBSTANCES (See Appendix for most frequently cited CAS Numbers)

01 CATEGORY	02 SUBSTANCE NAME	03 CAS NUMBER	04 STORAGE/DISPOSAL METHOD	05 CONCENTRATION	06 MEASURE OF CONCENTRATION
SOL	TETRACHLOROETHENE		SOIL	2 J	PPb
SOL	XYLENE (TOTAL)		SOIL	3 J	PPb
OCC	ISOPHORONE		SOIL	810	PPb
OCC	PHENANTHRENE		SOIL	250 J	PPb
OCC	FLUORANTHENE		SOIL	320 J	PPb
OCC	PYRENE		SOIL	250 J	PPb
OCC	CHRYSENE		SOIL	150 J	PPb
OCC	BENZO(b) FLUORANTHENE		SOIL	150 J	PPb
OCC	BENZO (a) PYRENE		SOIL	120 J	PPb
PSD	ARUCLOR - 1248		SOIL	120	PPb
PSD	ARUCLOR - 1254		SOIL	240 P	PPb
MES	CHROMIUM		SOIL	1150	PPM
MES	COPPER		SOIL	35400	PPM
MES	LEAD		SOIL	215	PPM
IOC	CYANIDE		SOIL	3	PPM
MES	ZINC		SOIL	215	PPM

V. FEEDSTOCKS (See Appendix for CAS Numbers)

CATEGORY	01 FEEDSTOCK NAME	02 CAS NUMBER	CATEGORY	01 FEEDSTOCK NAME	02 CAS NUMBER
FDS			FDS		
FDS			FDS		
FDS			FDS		
FDS			FDS		

VI. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)

SITE REPRESENTATIVE INTERVIEWS

IEPA SITE INSPECTION ON 5-425-94 AND ANALYTICAL RESULTS.

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

II. HAZARDOUS CONDITIONS AND INCIDENTS

01 [X] A. GROUNDWATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: 5174
02 ☐ OBSERVED (DATE 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION

ALL AREA DRINKING WATER IS OBTAINED FROM GROUNDWATER. MONITOR WELL SAMPLES COLLECTED ON 5-4-94 INDICATE LOW LEVELS OF METHYLENE CHLORIDE, bis(2-ETHYLHEXYL)PHTHALATE AND METALS ARE PRESENT.

01 ☐ B. SURFACE WATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

NONE

01 ☐ C. CONTAMINATION OF AIR
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

NONE

01 ☐ D. FIRE/EXPLOSIVE CONDITIONS
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

NONE

01 [X] E. DIRECT CONTACT
03 POPULATION POTENTIALLY AFFECTED: 4,886
02 ☐ OBSERVED (DATE 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION

SOIL SAMPLES INDICATE SEMIVOLATILES, VOLATILES, PESTICIDES AND INORGANIC SUBSTANCES ARE PRESENT IN THE DUMP AREA AT A DEPTH OF 6-8 INCHES.

01 [X] F. CONTAMINATION OF SOIL
03 AREA POTENTIALLY AFFECTED: 5 (ACRES)
02 ☐ OBSERVED (DATE 5-4-94) ☐ POTENTIAL [X] ALLEGED
04 NARRATIVE DESCRIPTION

SOIL IN THE DUMP AREA WAS FOUND TO CONTAIN VOLATILES, SEMIVOLATILE PESTICIDES, TENTATIVELY IDENTIFIED COMPOUNDS AND INORGANIC CONTAMINANTS.

01 [X] G. DRINKING WATER CONTAMINATION
03 POPULATION POTENTIALLY AFFECTED: 5174
02 ☐ OBSERVED (DATE _____) [X] POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

ALL DRINKING WATER IN THE AREA IS OBTAINED FROM GROUNDWATER

01 [X] H. WORKER EXPOSURE/INJURY
03 WORKERS POTENTIALLY AFFECTED: 1
02 ☐ OBSERVED (DATE _____) [X] POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

SITE IS CLOSED AND HAS ONE CUSTODIAN ONSITE.

01 ☐ I. POPULATION EXPOSURE/INJURY
03 POPULATION POTENTIALLY AFFECTED: _____
02 ☐ OBSERVED (DATE _____) ☐ POTENTIAL ☐ ALLEGED
04 NARRATIVE DESCRIPTION

NONE

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 3 - DESCRIPTION OF HAZARDOUS CONDITIONS AND INCIDENTS

I. IDENTIFICATION
01 STATE: IL | 02 SITE NUMBER: ILD 059483081

II. HAZARDOUS CONDITIONS AND INCIDENTS (Continued)

01 ☒ J. DAMAGE TO FLORA — 02 ☐ OBSERVED (DATE _____) — ☒ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
PORTIONS OF THE PROPERTY AND DRAINAGE OFFSITE IS CLASSIFIED AS A WETLAND. PROPERTY HAS BARE GROUND AREAS.

01 ☐ K. DAMAGE TO FAUNA — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION (Include names(s) of species)
NONE -

01 ☐ L. CONTAMINATION OF FOOD CHAIN — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ M. UNSTABLE CONTAINMENT OF WASTES (Spills, Runoff, Standing liquids, Leaking drums) — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
03 POPULATION POTENTIALLY AFFECTED: _____ — 04 NARRATIVE DESCRIPTION
NONE

01 ☒ N. DAMAGE TO OFFSITE PROPERTY — 02 ☐ OBSERVED (DATE _____) — ☒ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
WETLAND AREA THAT DRAINS THE PROPERTY HAD ELEVATED LEVELS OF COPPER.

01 ☐ O. CONTAMINATION OF SEWERS, STORM DRAINS, WWTPs — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

01 ☐ P. ILLEGAL/UNAUTHORIZED DUMPING — 02 ☐ OBSERVED (DATE _____) — ☐ POTENTIAL — ☐ ALLEGED
04 NARRATIVE DESCRIPTION
NONE

05 DESCRIPTION OF ANY OTHER KNOWN, POTENTIAL, OR ALLEGED HAZARDS
NONE

III. TOTAL POPULATION POTENTIALLY AFFECTED: 5174

IV. COMMENTS

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)
SITE RECON VISIT
SITE INSPECTION OF 5-4+5-94

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION
PART 4 - PERMIT AND DESCRIPTIVE INFORMATION

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

II. PERMIT INFORMATION

01 TYPE OF PERMIT ISSUED (Check all that apply)	02 PERMIT NUMBER	03 DATE ISSUED	04 EXPIRATION DATE	05 COMMENTS
☐ A. NPDES				
☐ B. UIC				
☐ C. AIR				
☐ D. RCRA				
☐ E. RCRA INTERIM STATUS				
☐ F. SPCC PLAN				
☐ G. STATE (Specify)				
☐ H. LOCAL (Specify)				
☐ I. OTHER (Specify)				
☒ J. NONE				UNDERGOING RCRA CLOSURE

III. SITE DESCRIPTION

01 STORAGE/DISPOSAL (Check all that apply)	02 AMOUNT	03 UNIT OF MEASURE
☐ A. SURFACE IMPOUNDMENT		
☒ B. PILES	UNKNOWN	
☐ C. DRUMS, ABOVE GROUND		
☐ D. TANK, ABOVE GROUND		
☐ E. TANK, BELOW GROUND		
☐ F. LANDFILL		
☐ G. LANDFARM		
☐ H. OPEN DUMP		
☐ I. OTHER (Specify)		

04 TREATMENT (Check all that apply)

- ☐ A. INCENERATION
- ☐ B. UNDERGROUND INJECTION
- ☐ C. CHEMICAL/PHYSICAL
- ☐ D. BIOLOGICAL
- ☐ E. WASTE OIL PROCESSING
- ☐ F. SOLVENT RECOVERY
- ☐ G. OTHER RECYCLING/RECOVERY
- ☐ H. OTHER (Specify)

05 OTHER

- ☐ A. BUILDINGS ON SITE

06 AREA OF SITE

5 (Acres)

07 COMMENTS

SITE HAS BEEN CLOSED SINCE 1988. DUMP AREA IS NOT OWNED BY SOUTHERN CALIFORNIA CHEMICAL CO.

IV. CONTAINMENT

01 CONTAINMENT OF WASTES (Check one)

☐ A. ADEQUATE, SECURE ☐ B. MODERATE ☒ C. INADEQUATE, POOR ☐ D. INSECURE, UNSOUND, DANGEROUS

02 DESCRIPTION OF DRUMS, DIKING, LINERS, BARRIERS, ETC.

LAND FILL AREA HAS PILES OF DIRT AND EXPOSED ELECTRONIC PRINTED CIRCUIT BOARDS.

V. ACCESSIBILITY

01 WASTE EASILY ACCESSIBLE ☒ YES ☐ NO

02 COMMENTS

SITE IS NOT FENCED ON THE EAST OR SOUTH SIDES.

VI. SOURCES OF INFORMATION (Cite specific references, e.g. state files, sample analysis, reports)

IEPA FILES

SITE RECON

SITE INSPECTION OF 5-4-94

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 5 - WATER, DEMOGRAPHIC, AND ENVIRONMENTAL DATA

I. IDENTIFICATION
01 STATE: IL | 02 SITE NUMBER: ILD 059 483 081

II. DRINKING WATER SUPPLY

01 TYPE OF DRINKING SUPPLY (Check as applicable)	SURFACE	WELL
COMMUNITY	A. ☐	B. ☒
NON-COMMUNITY	C. ☐	D. ☒

02 STATUS	ENDANGERED	AFFECTED	MONITORED
	A. ☒	B. ☐	C. ☐
	D. ☒	E. ☐	F. ☐

03 DISTANCE TO SITE
A. .28 (mi)
B. .17 (mi)

III. GROUNDWATER

01 GROUNDWATER USE IN VICINITY (Check one)
☒ A. ONLY SOURCE FOR DRINKING ☐ B. DRINKING (Other sources available) ☐ C. COMMERCIAL, INDUSTRIAL, IRRIGATION (Limited other sources available) ☐ D. NOT USED, UNUSEABLE
COMMERCIAL, INDUSTRIAL, IRRIGATION (No other water sources available)

02 POPULATION SERVED BY GROUND WATER: 5174
03 DISTANCE TO NEAREST DRINKING WATER WELL: .17 (mi)

04 DEPTH TO GROUNDWATER	05 DIRECTION OF GROUNDWATER FLOW	06 DEPTH TO AQUIFER OF CONCERN	07 POTENTIAL YIELD OF AQUIFER	08 SOLE SOURCE AQUIFER
20 (ft)	NORTHWEST	20 (ft)	— (gpd)	☐ YES ☒ NO

09 DESCRIPTION OF WELLS (Including usage, depth, and location relative to population and buildings)
UNION WELL 2 - 192' DEEP USING SHALLOW BEDROCK AQUIFER, LOCATED (b) (9) [redacted]
UNION WELL 4 - 760' DEEP USING SANDSTONE AQUIFER, LOCATED (b) [redacted]
RESIDENTIAL WELLS - USE GLACIAL DRIFT & BEDROCK AQUIFERS

10 RECHARGE AREA	COMMENTS	11 DISCHARGE AREA	COMMENTS
☐ YES ☐ NO		☐ YES ☐ NO	

IV. SURFACE WATER

01 SURFACE WATER USE (Check one)
☐ A. RESERVOIR, RECREATION, DRINKING WATER SOURCE ☐ B. IRRIGATION, ECONOMICALLY IMPORTANT RESOURCES ☐ C. COMMERCIAL, INDUSTRIAL ☒ D. NOT CURRENTLY USED

02 AFFECTED/POTENTIALLY AFFECTED BODIES OF WATER

NAME	AFFECTED	DISTANCE TO SITE
NONE	☐	(mi)
	☐	(mi)
	☐	(mi)

V. DEMOGRAPHIC AND PROPERTY INFORMATION

01 TOTAL POPULATION WITHIN

ONE (1) MILE OF SITE	TWO (2) MILES OF SITE	THREE (3) MILES OF SITE
A. 672 (NO. OF PERSONS)	B. 966 (NO. OF PERSONS)	C. 1400 (NO. OF PERSONS)

02 DISTANCE TO NEAREST POPULATION: .1 (mi)

03 NUMBER OF BUILDINGS WITHIN TWO (2) MILES OF SITE	04 DISTANCE TO NEAREST OFF-SITE BUILDING
—	.02 (mi)

05 POPULATION WITHIN VICINITY OF SITE (Provide narrative description of nature of population within vicinity of site (e.g., rural, village, densely populated urban area))
VILLAGE OF UNION LIES WEST WITH SITE BEING LOCATED ON THE FRINGE OF TOWN LIMITS. NORTH AND NORTHEAST ARE COMMERCIAL BUSINESSES WITH FARMLAND SURROUNDING SITE ON EAST & SOUTH SIDES.

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 5 - WATER, DEMOGRAPHIC, AND ENVIRONMENTAL DATA

EPA

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

VI. ENVIRONMENTAL INFORMATION

01 PERMEABILITY OF UNSATURATED ZONE (Check one)

☐ A. 10^{-6} – 10^{-8} cm/sec ☒ B. 10^{-4} – 10^{-6} cm/sec ☐ C. 10^{-4} – 10^{-3} cm/sec ☐ D GREATER THAN 10^{-3} cm/sec

02 PERMEABILITY OF BEDROCK (Check one)

☐ A. IMPERMEABLE (Less than 10^{-6} cm/sec) ☐ B. RELATIVELY IMPERMEABLE (10^{-4} – 10^{-6} cm/sec) ☒ C. RELATIVELY PERMEABLE (10^{-2} – 10^{-4} cm/sec) ☐ D. VERY PERMEABLE (Greater than 10^{-2} cm/sec)

03 DEPTH TO BEDROCK	04 DEPTH OF CONTAMINATED SOIL ZONE	05 SOIL pH	
120 (ft)	UNKNOWN (ft)	—	

06 NET PRECIPITATION	07 ONE YEAR 24 HOUR RAINFALL	08 SLOPE		
		SITE SLOPE	DIRECTION OF SITE SLOPE	TERRAIN AVERAGE SLOPE
3.5 (in)	2.8 (in)	1 %	E & N	1 %

09 FLOOD POTENTIAL

SITE IS IN >500 YEAR FLOODPLAIN

10

☐ SITE IS ON BARRIER ISLAND, COASTAL HIGH HAZARD AREA, RIVERINE FLOODWAY

11 DISTANCE TO WETLANDS (5 acre minimum)

ESTUARINE	OTHER
A. ____ (mi)	B. 0 (mi)

12 DISTANCE TO CRITICAL HABITAT (of endangered species)

— (mi)

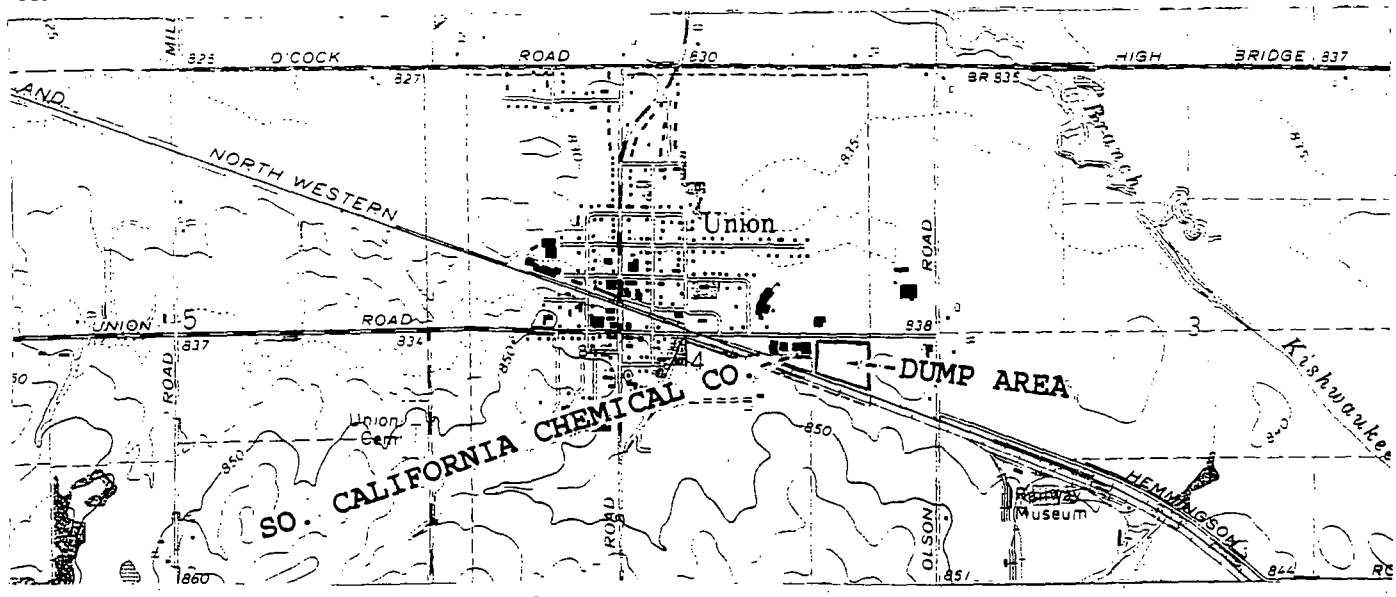
ENDANGERED SPECIES: —

13 LAND USE IN VICINITY

DISTANCE TO:

COMMERCIAL/INDUSTRIAL	RESIDENTIAL AREAS, NATIONAL/STATE PARKS, FORESTS, OR WILDLIFE RESERVES	AGRICULTURAL LANDS	
		PRIME AG LAND	AG LAND
A .02 (mi)	B — (mi)	C .04 (mi)	D ____ (mi)

14 DESCRIPTION OF SITE IN RELATION TO SURROUNDING TOPOGRAPHY



VII. SOURCES OF INFORMATION (Cite specific references, e.g. state files, sampling results, reports)

IEPA FILES
HAZARD REVIEW REPORT FOR UNION PUBLIC WATER SUPPLY (IEPA)
SITE RECON & INSPECTION

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 6 - SAMPLE AND FIELD INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059483081

II. SAMPLES TAKEN

SAMPLE TYPE	01 NUMBER OF SAMPLES TAKEN	02 SAMPLES SENT TO	03 ESTIMATED DATE RESULTS AVAILABLE
GROUNDWATER	3	SOUTHWEST LABS OF OKLAHOMA SILVER VALLEY LABS MERA CENTRAL REGION LAB - CHICAGO - DRINKING WATER	
SURFACE WATER			
WASTE			
AIR			
RUNOFF			
SPILL			
SOIL	10	SOUTHWEST LABS OF OKLAHOMA (BROKEN ARROW, OK) SILVER VALLEY LABS (KELLOG, IDAHO)	
VEGETATION			
OTHER			

III. FIELD MEASUREMENTS TAKEN

01 TYPE	02 COMMENTS
HNU	NO READINGS OVER BACKGROUND
ph	—
CONDUCTIVITY	—
TEMPERATURE	—

IV. PHOTOGRAPHS AND MAPS

01 TYPE ☒ GROUND ☐ AERIAL

02 IN CUSTODY OF IEPA
(Name of organization or individual)

03 MAPS ☒ YES ☐ NO

04 LOCATION OF MAPS IEPA

V. OTHER FIELD DATA COLLECTED (Describe results briefly)

NONE

VI. SOURCES OF INFORMATION (Cite specific references, e.g. state files, sampling results)

IEPA SITE INSPECTION OF MAY 4-5, 1994

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 7 - OWNER INFORMATION

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD 059483081

II. CURRENT OWNER(S) | **PARENT COMPANY** (If applicable)

Current Owner				Parent Company			
01 NAME	UNKNOWN	02 D+B NUMBER		08 NAME		09 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, RFD #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	12 CITY		13 STATE	14 ZIP CODE:
01 NAME		02 D+B NUMBER		08 NAME		09 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, RFD #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	12 CITY		13 STATE	14 ZIP CODE:
01 NAME		02 D+B NUMBER		08 NAME		09 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, RFD #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	12 CITY		13 STATE	14 ZIP CODE:
01 NAME		02 D+B NUMBER		08 NAME		09 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		10 STREET ADDRESS (P.O. Box, RFD #, etc.)		11 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	12 CITY		13 STATE	14 ZIP CODE:

III. PREVIOUS OWNER(S) (List most recent first) | **IV. REALTY OWNER(S)** (If applicable, list most recent first)

Previous Owner				Realty Owner			
01 NAME	EDWIN B. KING	02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	CALSO IL CORP	04 SIC CODE		03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE	
05 CITY	AUSTIN	06 STATE: TX	07 ZIP CODE:	05 CITY		06 STATE	07 ZIP CODE:
01 NAME		02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	05 CITY		06 STATE	07 ZIP CODE:
01 NAME		02 D+B NUMBER		01 NAME		02 D+B NUMBER	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE		03 STREET ADDRESS (P.O. Box, RFD #, etc.)		04 SIC CODE	
05 CITY		06 STATE	07 ZIP CODE:	05 CITY		06 STATE	07 ZIP CODE:

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)

MCHENRY COUNTY COURTHOUSE RECORDS
IEPA FILES
SITE REPRESENTATIVE INTERVIEWS

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 8 - OPERATOR INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059 483 081

II. CURRENT OPERATOR (Provide if different from owner)

01 NAME	02 D+B NUMBER
NONE	

03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE

05 CITY	06 STATE	07 ZIP CODE

08 YEARS OF OPERATION	09 NAME OF OWNER

OPERATOR'S PARENT COMPANY (If applicable)

10 NAME	11 D+B NUMBER

12 STREET ADDRESS (P.O. Box, RFD #, etc.)	13 SIC CODE

14 CITY	15 STATE	16 ZIP CODE

III. PREVIOUS OPERATOR(S) (List most recent first; provide only if different from owner)

01 NAME	02 D+B NUMBER

03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE

05 CITY	06 STATE	07 ZIP CODE

08 YEARS OF OPERATION	09 NAME OF OWNER DURING THIS PERIOD

PREVIOUS OPERATORS' PARENT COMPANIES (If applicable)

10 NAME	11 D+B NUMBER

12 STREET ADDRESS (P.O. Box, RFD #, etc.)	13 SIC CODE

14 CITY	15 STATE	16 ZIP CODE

01 NAME	02 D+B NUMBER

03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE

05 CITY	06 STATE	07 ZIP CODE

08 YEARS OF OPERATION	09 NAME OF OWNER DURING THIS PERIOD

10 NAME	11 D+B NUMBER

12 STREET ADDRESS (P.O. Box, RFD #, etc.)	13 SIC CODE

14 CITY	15 STATE	16 ZIP CODE

01 NAME	02 D+B NUMBER

03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE

05 CITY	06 STATE	07 ZIP CODE

08 YEARS OF OPERATION	09 NAME OF OWNER DURING THIS PERIOD

10 NAME	11 D+B NUMBER

12 STREET ADDRESS (P.O. Box, RFD #, etc.)	13 SIC CODE

14 CITY	15 STATE	16 ZIP CODE

IV. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)

MCHENRY COUNTY COURTHOUSE RECORDS

IEPA FILES

SITE REPRESENTATIVE INTERVIEWS

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 9 - GENERATOR/TRANSPORTER INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059493081

II. ON-SITE GENERATOR

01 NAME	02 D+B NUMBER
NONE	
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE / 07 ZIP CODE

III. OFF-SITE GENERATOR(S)

01 NAME	02 D+B NUMBER	01 NAME	02 D+B NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE / 07 ZIP CODE	05 CITY	06 STATE / 07 ZIP CODE
01 NAME	02 D+B NUMBER	01 NAME	02 D+B NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE / 07 ZIP CODE	05 CITY	06 STATE / 07 ZIP CODE

IV. TRANSPORTER(S)

01 NAME	02 D+B NUMBER	01 NAME	02 D+B NUMBER
NONE			
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE / 07 ZIP CODE	05 CITY	06 STATE / 07 ZIP CODE
01 NAME	02 D+B NUMBER	01 NAME	02 D+B NUMBER
03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE	03 STREET ADDRESS (P.O. Box, RFD #, etc.)	04 SIC CODE
05 CITY	06 STATE / 07 ZIP CODE	05 CITY	06 STATE / 07 ZIP CODE

V. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)

IEPA FILES

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 10 - PAST RESPONSE ACTIVITIES

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059483081

II. PAST RESPONSE ACTIVITIES

01 ☐ A. WATER SUPPLY CLOSED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ B. TEMPORARY WATER SUPPLY PROVIDED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ C. PERMANENT WATER SUPPLY PROVIDED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ D. SPILLED MATERIAL REMOVED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ E. CONTAMINATED SOIL REMOVED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ F. WASTE REPACKAGED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ G. WASTE DISPOSED ELSEWHERE — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ H. ON SITE BURIAL — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ I. IN SITU CHEMICAL TREATMENT — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ J. IN SITU BIOLOGICAL TREATMENT — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ K. IN SITU PHYSICAL TREATMENT — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ L. ENCAPSULATION — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ M. EMERGENCY WASTE TREATMENT — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ N. CUTOFF WALLS — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ O. EMERGENCY DIKING/SURFACE WATER DIVERSION — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ P. CUTOFF TRENCHES/SUMP — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ Q. SUBSURFACE CUTOFF WALL — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 11 - ENFORCEMENT INFORMATION

I. IDENTIFICATION	
01 STATE	02 SITE NUMBER
IL	ILD 059483081

II. ENFORCEMENT INFORMATION

01 PAST REGULATORY/ENFORCEMENT ACTION ☐ YES ☒ NO

02 DESCRIPTION OF FEDERAL, STATE, LOCAL REGULATORY/ENFORCEMENT ACTION

NONE

III. SOURCES OF INFORMATION (Cite specific references, e.g., state files, sample analysis, reports)

IEPA FILES

EPA

POTENTIAL HAZARDOUS WASTE SITE
SITE INSPECTION REPORT
PART 10 - PAST RESPONSE ACTIVITIES

I. IDENTIFICATION

01 STATE	02 SITE NUMBER
IL	ILD059483081

II. PAST RESPONSE ACTIVITIES (Continued)

01 ☐ R. BARRIER WALLS CONSTRUCTED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ S. CAPPING/COVERING — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ T. BULK TANKAGE REPAIRED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ U. GROUT CURTAIN CONSTRUCTED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ V. BOTTOM SEALED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ W. GAS CONTROL — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ X. FIRE CONTROL — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ Y. LEACHATE TREATMENT — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ Z. AREA EVACUATED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ 1. ACCESS TO SITE RESTRICTED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ 2. POPULATION RELOCATED — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

01 ☐ 3. OTHER REMEDIAL ACTIVITIES — 02 DATE _____ — 03 AGENCY _____
04 DESCRIPTION
N/A

III. SOURCES OF INFORMATION (Cite specific references e.g. state files, sample analysis, reports)

IEPA FILES

APPENDIX D

TARGET COMPOUND LIST

SOUTHERN CALIFORNIA CHEMICAL COMPANY

TARGET COMPOUND LIST

Volatile Target Compounds

Chloromethane	1,2-Dichloropropane
Bromomethane	cis-1,3-Dichloropropene
Vinyl Chlorde	Trichloroethene
Chloroethane	Dibromochloromethane
Methylene Chloride	1,1,2-Trichloroethane
Acetone	Benzene
Carbon Disulfide	trans-1,3-Dichloropropene
1,1-Dichloroethene	Bromoform
1,1-Dichloroethane	4-Methyl-2-pentanone
1,2-Dichloroehtene (total)	2-Hexanone
Chloroform	Tetrachloroethene
1,2-Dichloroethane	1,1,2,2-Tetrachloroethane
2-Butanone	Toluene
1,1,1-Trichloroethane	Chlorobenzene
Carbon Tetrachloride	Ethylbenzene
Vinyl Acetate	Styrene
Bromodichloromethane	Xylenes (total)

Base/Neutral Target Compounds

Hexachloroethane	2,4-Dinitrotoluene
bis(2-Chloroethyl) Ether	Diethylphthalate
Benzyl Alcohol	N-Nitrosodiphenylamine
bis (2-Chloroisopropyl) Ether	Hexachlorobenzene
N-Nitroso-Di-n-Propylamine	Phenanthrene
Nitrobenzene	4-Bromophenyl-phenylether
Hexachlorobutadiene	Anthracene

2-Methylnaphthalene	Di-n-Butylphthalate
1,2,4-Trichlorobenzene	Fluoranthene
Isophorone	Pyrene
Naphthalene	Butylbenzylphthalate
4-Chloroaniline	bis(2-Ethylhexyl)Phthalate
bis(2-chloroethoxy)Methane	Chrysene
Hexachlorocyclopentadiene	Benzo(a)Anthracene
2-Chloronaphthalene	3-3'-Dichlorobenzidene
2-Nitroaniline	Di-n-Octyl Phthalate
Acenaphthylene	Benzo(b)Fluoranthene
3-Nitroaniline	Benzo(k)Fluoranthene
Acenaphthene	Benzo(a)Pyrene
Dibenzofuran	Ideno(1,2,3-cd)Pyrene
Dimethyl Phthalate	Dibenz(a,h)Anthracene
2,6-Dinitrotoluene	Benzo(g,h,i)Perylene
Fluorene	1,2-Dichlorobenzene
4-Nitroaniline	1,3-Dichlorobenzene
4-Chlorophenyl-phenylether	1,4-Dichlorobenzene

Acid Target Compounds

Benzoic Acid	2,4,6-Trichlorophenol
Phenol	2,4,5-Trichlorophenol
2-Chlorophenol	4-Chloro-3-methylphenol
2-Nitrophenol	2,4-Dinitrophenol
2-Methylphenol	2-Methyl-4,6-dinitrophenol
2,4-Dimethylphenol	Pentachlorophenol
4-Methylphenol	4-Nitrophenol
2,4-Dichlorophenol	

Pesticide/PCB Target Compounds

alpha-BHC	Endrin Ketone
beta-BHC	Endosulfan Sulfate
delta-BHC	Methoxychlor
gamma-BHC (Lindane)	alpha-Chlordane
Heptachlor	gamma-Chlordane
Aldrin	Toxaphene
Heptachlor epoxide	Aroclor-1016
Endosulfan I	Aroclor-1221
4,4'-DDE	Aroclor-1232
Dieldrin	Aroclor-1242
Endrin	Aroclor-1248
4,4'-DDD	Aroclor-1254
Endosulfan II	Aroclor-1260
4,4'-DDT	

Inorganic Target Compounds

Aluminum	Manganese
Antimony	Mercury
Arsenic	Nickel
Barium	Potassium
Beryllium	Selenium
Cadmium	Silver
Calcium	Sodium
Chromium	Thallium
Cobolt	Vanadium
Copper	Zinc
Iron	Cyanide
Lead	Sulfide
Magnesium	

DATA QUALIFIERS

QUALIFIER	DEFINITION ORGANICS	DEFINITION INORGANICS
U	Compound was tested for but not detected. The sample quantitation limit must be corrected for dilution and for percent moisture. For soil samples subjected to GPC clean-up procedures, the CRQL is also multiplied by two, to account for the fact that only half of the extract is recovered.	Analyte was analyzed for but not detected.
J	Estimated value. Used when estimating a concentration for tentatively identified compounds (TICS) where a 1:1 response is assumed or when the mass spectral data indicate the presence of a compound that meets the identification criteria and the result is less than the sample quantitation limit but greater than zero. Used in data validation when the quality control data indicate that a value may not be accurate.	Estimated value. Used in data validation when the quality control data indicate that a value may not be accurate.
C	This flag applies to pesticide results where the identification is confirmed by GC/MS.	Method qualifier indicates analysis by the Manual Spectrophotometric method.
B	Analyte was found in the associated blank as well as in the sample. It indicates possible/probable blank contamination and warns the data user to take appropriate action.	The reported value is less than the CRDL but greater than the instrument detection limit (IDL).
D	Identifies all compounds identified in an analysis at a secondary dilution factor. If a sample or extract is re-analyzed at a higher dilution factor as in the "E" flag, the "DL" suffix is appended to the sample number on the Form I for the diluted sample, and all concentration values are flagged with the "D" flag.	Not used.
E	Identifies compounds whose concentrations exceed the calibration range for that specific analysis. All extracts containing compounds exceeding the calibration range must be diluted and analyzed again. If the dilution of the extract causes any compounds identified in the first analysis to be below the calibration range in the second analysis, then the results of both analyses must be reported on separate Forms I. The Form I for the diluted sample must have the "DL" suffix appended to the sample number.	The reported value is estimated because of the presence of interference.
A	This flag indicates that a TIC is a suspected aldol concentration product formed by the reaction of the solvents used to process the sample in the laboratory.	Method qualifier indicates analysis by Flame Atomic Absorption (AA).
M	Not used.	Duplicate injection (a QC parameter not met).

N	Not used	Spiked sample (a QC parameter not met).
S	Not used.	The reported value was determined by the Method of Standard Additions (MSA).
W	Not used.	Post digestion spike for Furnace AA analysis (a QC parameter) is out of control limits of 85% to 115% recovery, while sample absorbance is less than 50% of spike absorbance.
*	Not used.	Duplicate analysis (a QC parameter not within control limits).
+	Not used.	Correlation coefficient for MSA (a QC parameter) is less than 0.995.
P	Not used.	Method qualifier indicates analysis by ICP (Inductively Coupled Plasma) Spectroscopy.
CV	Not used.	Method qualifier indicates analysis by Cold Vapor AA.
AV	Not used.	Method qualifier indicates analysis by Automated Cold Vapor AA.
AS	Not used.	Method qualifier indicates analysis by Semi-Automated Cold Spectrophotometry.
T	Not used.	Method qualifier indicates Titrimetric analysis.
NR	The analyte was not required to be analyzed.	The analyte was not required to be analyzed.
R	Rejected data. The QC parameters indicate that the data is not usable for any purpose.	Rejected data. The QC parameters indicate that the data is not usable for any purpose.

APPENDIX E

IEPA SITE PHOTOGRAPHS

SOUTHERN CALIFORNIA CHEMICAL COMPANY

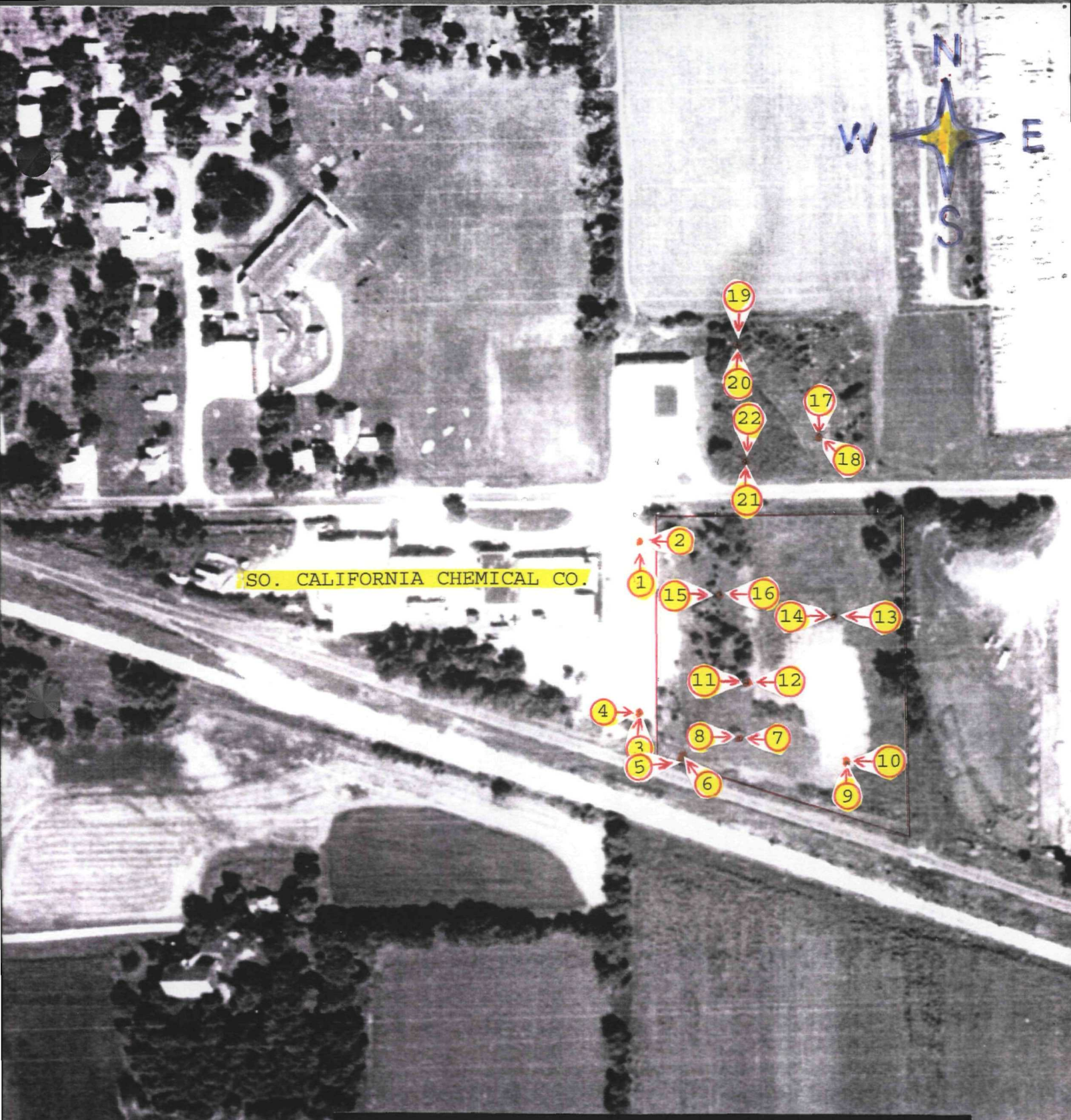


PHOTO LOCATION MAP

SOUTHERN CALIFORNIA CHEMICAL CO.

Approximate scale: 1 inch equals 200 feet

From: Illinois Department of Transportation
aerial photo taken August 26, 1988

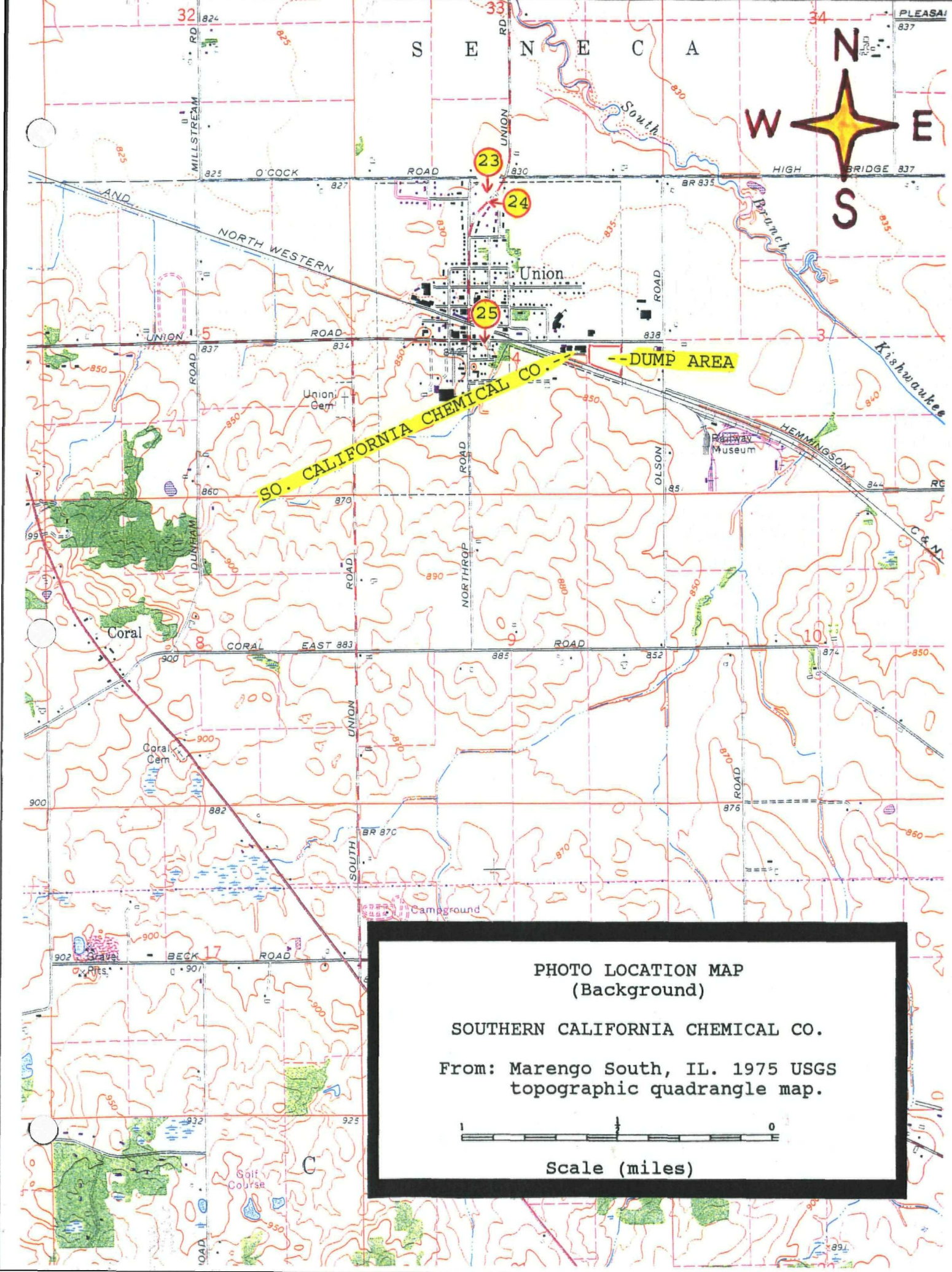


PHOTO LOCATION MAP
(Background)

SOUTHERN CALIFORNIA CHEMICAL CO.

From: Marengo South, IL. 1975 USGS topographic quadrangle map.

1 0

Scale (miles)

DATE: May 4, 1994

TIME: 11:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 1

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the north.

Photo taken at sample point G101. The SO GOOD BAR B QUE Company in the background is an active business and lies across Jefferson Street.

DATE: May 4, 1994

TIME: 11:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 2

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Manufacturing building of So. California Chemical Co. is to the upper left. The well to the right is a piezometer and was not sampled. Jefferson Street is to the right of the photo.

DATE: May 4, 1994

TIME: 12:05

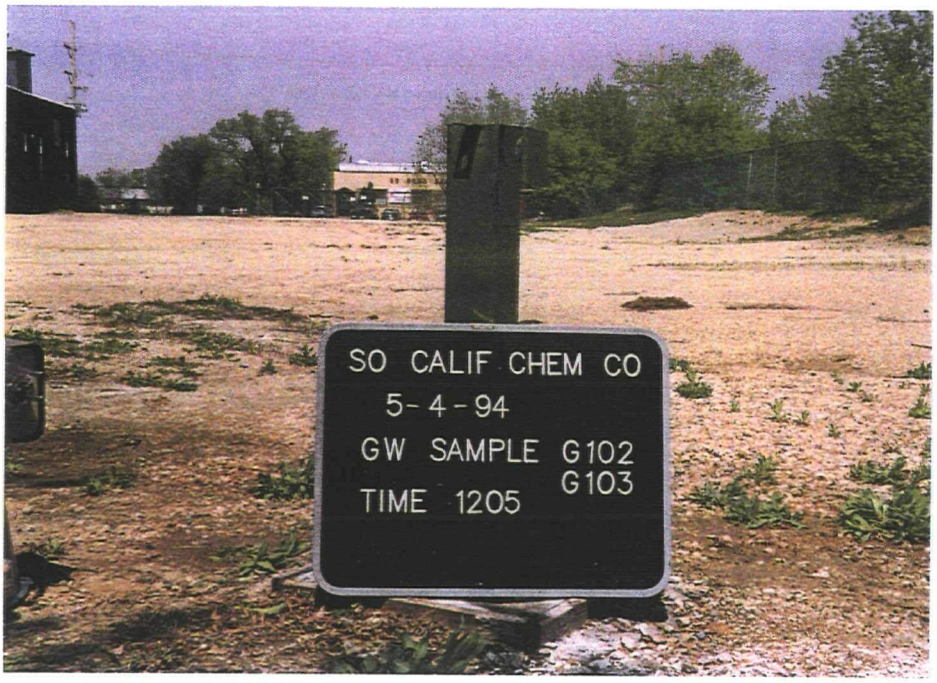
PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 3

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the north.

Sample G102 and duplicate sample G103 collected from a monitoring well located near the southeast corner of the So. Calif. Chemical Co. property. Dump area lies to the right beyond the green fence.



DATE: May 4, 1994

TIME: 12:05

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 4

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

The dump area lies beyond the fence. The CNW RR tracks are to the right of the photo.

DATE: May 4, 1994

TIME: 14:20

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 5

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

Sample X102 was collected in a drainage pathway along the CNW Railroad tracks, which can be seen in the upper right corner of the photo.

DATE: May 4, 1994

TIME: 14:20

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 6

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the northwest.

Sample X102 was collected at a depth of 2 to 3 feet. The southeast corner of the fence of So. Calif. Chem. Co. is left of the rusted object. The dump area is to the right.

DATE: May 4, 1994

TIME: 15:40

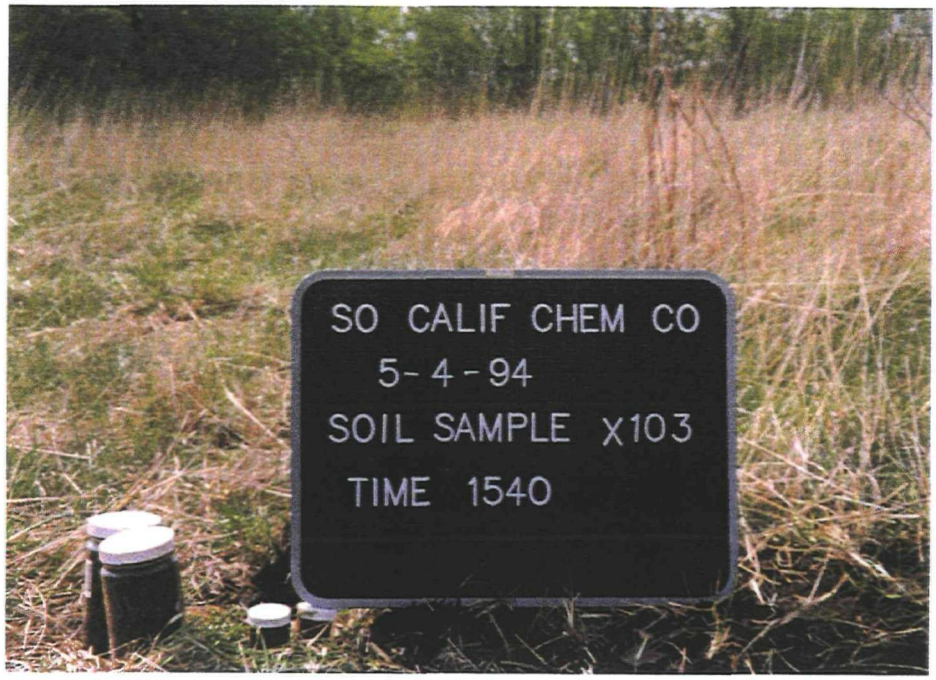
PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 7

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample X103 was collected in the southwestern part of the dump area. The sampling depth was 6 to 8 inches where a brown layer was encountered.



DATE: May 4, 1994

TIME: 15:40

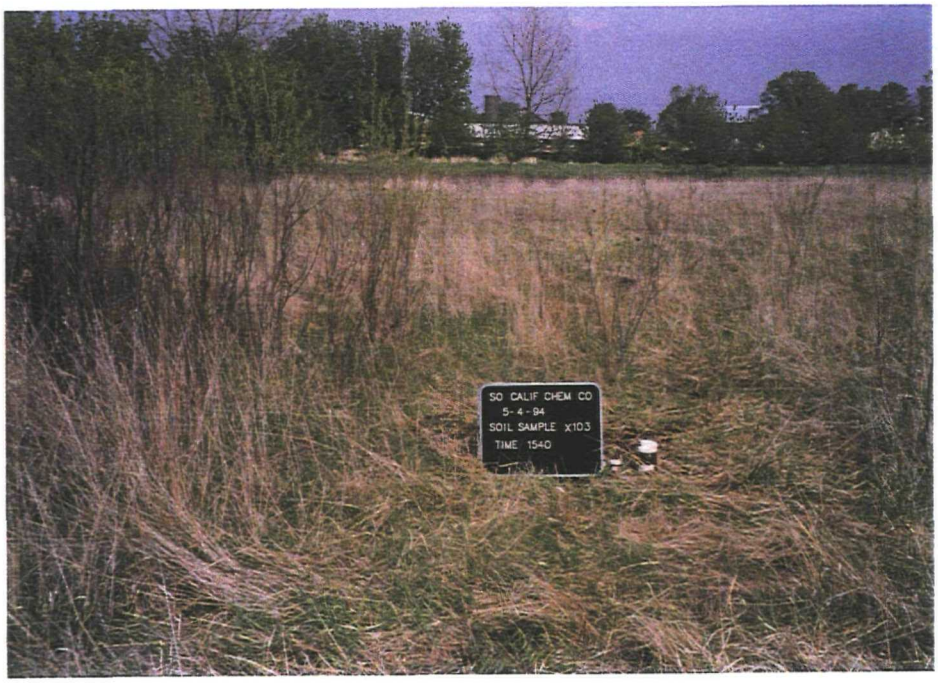
PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 8

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

Sample X103 was collected on the high portion of the dump area. This part of the property has a layer of printed circuit board debris under the surface which the hand augers could not penetrate.



DATE: May 4, 1994

TIME: 16:15

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 9

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the north.

Sample X104 and duplicate sample X105 were collected at this location and inadvertently listed as X103 on the photo board. The sample was obtained in a low area in the southeast section of the dump area. Note RV tracks.

DATE: May 4, 1994

TIME: 16:15

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 10

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample point X104/X105 mistakenly labeled as X103 on the photo board. Sample was obtained at a depth of 2 to 3 feet in an area that contains standing water during various times of the year.

DATE: May 5, 1994

TIME: 10:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 11

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

Sample collected in the central portion of the dump area on high ground near the boundary with the lower ground. Sample collected at a depth of 2 to 3 feet.

DATE: May 5, 1994

TIME: 10:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 12

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample X106. So. Calif. Chemical Co. property is beyond the fence at the top of the hill.

DATE: May 5, 1994

TIME: 10:45

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 13

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample X107 collected at the northeast section of the dump area at a depth of 2 to 3 feet.

DATE: May 5, 1994

TIME: 10:45

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 14

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

Sample X107. Property ends at the treeline at the top of the photo.

DATE: May 5, 1994

TIME: 11:05

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 15

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the east.

Sample X108 in the north-west portion of the dump area on the high ground side. The sample was collected at a depth of 2.5 to 3.5 feet.

DATE: May 5, 1994

TIME: 11:05

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 16

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample X108. The fence separating the dump area and the So. Calif. Chem. Co. property is approxi-mately 95 feet beyond the photoboard.

DATE: May 5, 1994

TIME: 11:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 17

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the south.

Sample X109 was collected from a wetland north of the dump area across Jefferson Street at a depth of 6 to 12 inches. Beyond the fence in the background is the dump area.

DATE: May 5, 1994

TIME: 11:25

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 18

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the northwest.

Sample X109.

DATE: May 5, 1994

TIME: 11:45

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 19

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the south.

Sample X110 collected from the northern portion of the wetland located north of the dump area. Sample was collected at a depth of 6 to 12 inches.

DATE: May 5, 1994

TIME: 11:45

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 20

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the north.

Sample X110. The So Good Bar B Que company is located left of the photo.

DATE: May 5, 1994

TIME: 12:15

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 21

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the north.

Sample X111 collected in the wetland located north of the dump area. The sample was collected at a depth of 6 to 12 inches.

DATE: May 5, 1994

TIME: 12:15

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 22

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the south.

Sample X111. Jefferson Street is visible in the upper portion of the photo.

DATE: May 5, 1994

TIME: 12:50

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 23

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the south.

Background sample X101 collected at Union Park, located approximately 3,000 feet northwest of the site.

DATE: May 5, 1994

TIME: 12:50

PHOTOGRAPH TAKEN BY:
Robert Casper

PHOTO NUMBER: 24

LOCATION: L 1110900002
McHenry County
So. Calif. Chemical Co.
ILD: 059483081

PICTURE TAKEN TOWARD
the west.

Sample X101 was collected at a depth of 6 to 12 inches.

(b) (9)